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ABSTRACT

This document comprises three sets of papers produced by a subregional seminar of the Asian Programme of Educational Innovation for Development (APEID). The first chapter is an overview of experiences in orientation and training of key educational personnel in integrated curriculum. Chapter 2 consists of guidelines and checklists for developing training programs and materials. Chapter 3 consists of selected exemplary materials resulting from workshops at the seminar: (1) a training manual from Korea on "Teaching Pleasant Life"; (2) instructional modules on using local, low-cost resources and community participation (Korea), developing questioning skills in environmental studies (Nepal), and principles of the integrated curriculum (Korea); (3) teacher leaflets from Bangladesh on improving pupil enrollment, encouraging community participation in schools, preparing an individual lesson, and identifying and helping physically handicapped children; (4) teacher guides from India on food, good habits, and life of plants and animals; and (5) instructional plans on receiving guests and on food from Thailand. Appended are the agenda of the conference, a list of participants, and a list of documents. (TE)

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TRAINING EDUCATIONAL PERSONNEL FOR INTEGRATED CURRICULUM

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Unesco Regional Office for Education in Asia and the Pacific
Bangkok, 1984

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FOR INTEGRATED
CURRICULUM**

*Report of a Seminar on
Further Training of National Officials
and Specialists on Integration of the
Curriculum at the Primary Level*

Dhaka, Bangladesh, 1-10 June 1983



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Bangkok, 1984**

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PREFACE

Pursuant to the educational programme approved by the Member States at the Twenty First Session and under the theme 1/5.5/02 at the Medium-term plan of Unesco, Unesco convened the APEID Sub-regional Seminar on Further Training of National Officials and Specialists on Integration of the Curriculum at the Primary Level at the National Institute of Educational Administration, Extension and Research (NIEAER), Dhanmondi, Dhaka, Bangladesh, from 1 to 10 June 1983.

The objectives of the Sub-regional Seminar were to:

1. revise and examine experiences and insights on orientation and training of key educational personnel in integration of curriculum;
2. plan and organize orientation and training programmes for key educational personnel;
3. review and examine training materials on integrated curriculum; and
4. develop guidelines on preparation of training materials for use in the national training programme.

The Sub-regional Seminar was attended by one participant each from India, Malaysia, Nepal, Republic of Korea, Sri Lanka and Thailand and four from Bangladesh. In addition, four educators from Bangladesh attended as observers. Participants for the Sub-regional Seminar were drawn from those persons responsible for nationally organizing workshops and training for educational personnel needed to implement integrated curriculum. In respect of the countries which have participated in the APEID Joint Innovative Project on the same subject, selection was made from among the specialists/administrators who took a leading part in the project.

The sub-regional Seminar was inaugurated by H.E. Dr. A. Majeed Khan, Minister of Education, Government of the People's Republic of Bangladesh. In his address, Dr. Khan laid emphasis on the key role that the teacher and teacher educators play in the implementation of any new curriculum programme and organization of training programmes or courses. He expressed his appreciation that the Seminar would review and examine key issues related to integrated curriculum and orientation and training of key educational personnel, and hoped that the participating countries would benefit from the deliberations.

Before the Honourable Minister addressed the gatherings, Dr. M.N. Haq, Director-General of the National Institute of Educational Administration, Extension and Research, in his welcome address, thanked the Unesco Regional Office for Education in Asia and the Pacific for selecting his institute for the venue of the Sub-regional Seminar. Dr. H.K. Paik, Specialist in New Methods in Teacher Education (ACEID), in his remarks, pointed out the objectives, agenda and plan of action set before the Seminar. The inaugural session ended with a vote of thanks by Mr. A.R. Chowdhury, Secretary, Bangladesh National Commission for Unesco.

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In the plenary session, the agenda (which appears in Annex I) and the provisional schedule of work were formally adopted. The following officers were elected:

Chairman : Dr. M.N. Haq (Bangladesh)
Director-General
National Institute of Educational
Administration, Extension and Research Dhaka

Vice-Chairman : (1) Dr. Arfah Bte Abdul Aziz (Malaysia)
Assistant Director for Primary Curriculum
Curriculum Development Centre
Ministry of Education
Kuala Lumpur

(2) Dr. Siriporn Boonyananta (Thailand)
Senior Curriculum Co-ordinator
Curriculum Development Centre
Ministry of Education
Sukhumvit Road, Bangkok

Rapporteur : Dr. S.A. Chowdhury (Bangladesh)
Director
National Institute of Educational
Administration, Extension and Research Dhaka

The Sub-regional Seminar consequently produced three sets of papers:

1. Accounts of the participating countries experience and insights on the training of key educational personnel in the integration of curriculum;
2. Guidelines on the organization of training programmes and development of materials;
3. A set of selected exemplar materials, introduced by the participants and revised in accordance with the group comments.

The exemplar materials dealt with in the third chapter are classified as: a) a training manual; b) instructional modules, teacher leaflet, d) teachers guide; and e) instructional plan.

Chapter Two, Guidelines and Chapter Three, Exemplar Materials are included as helpful reference materials not only for participating countries but for any other country which may launch a programme on the training of educational personnel in integrated curriculum at the primary level.

The contributions of the participants who provided guidelines and exemplar materials for this report are acknowledged with gratitude. Special thanks are due to the National Institute of Educational Administration, Extension and Research (NIEAER), Dhaka for providing the venue and supportive staff which made possible a productive working climate for the Seminar.

Chapter One

EXPERIENCES ON ORIENTATION AND TRAINING OF KEY EDUCATIONAL PERSONNEL IN INTEGRATED CURRICULUM

Overview

There has been a growing concern in Asia to direct educational efforts towards achieving the balanced development of children by adequately preparing them to adjust to a rapidly changing society so as to enable them to lead a happy personal and social life. This increasing awareness coupled with the inadequacy of the traditional curriculum has led many countries in the region to search for innovations that will make the content and process of education more relevant, meaningful and interesting to the learners. The participating countries in the APEID Joint Innovative Project for integrated curriculum at the primary level have expressed their strong commitment to make the learning experiences more real and meaningful, responding to the natural and spontaneous enquiry of the young learners.

In the planning meeting on Joint Innovative Project on Integrating subject Areas held in Seoul, Republic of Korea in November 1980, members of the participating countries agreed to define 'Curriculum Integration' as the reconstruction of knowledge and experiences as a whole to suit the needs and life situation of children with a view to enabling them to develop individuality and become useful members of the society. This is a broad definition extolling the philosophy of Integrated Curriculum and certainly does not aim at providing operational guidelines to develop the planning and implementation programme of Integrated Curriculum. The concept, aims and objectives of Integrated Curriculum as well as its methods of designing and implementation must be formulated within the framework of each country's educational goals and objectives, structures, resources, socio-economic traditions and needs.

The current practices and experience of the participating countries demonstrate a great variety of approaches to (e.g. centralized, decentralized and mixed) and forms of curriculum integration (e.g. by fields of subject, themes or projects and by emerging interests).

There is a varying degree of emphasis on aspects of curriculum integration (e.g. integration of the knowledge and learning process, cognition and affect, knowledge and conduct, school learning with actual life experience and integration of subject areas) among participating countries.

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Again, viewed as a continuum the integrated curriculum ranges from partial to total integration. Among the participating countries that have attempted to develop total integration in curriculum, doubts have been expressed as to the adequacy of the total integrated approach in mathematics and language. It is felt that some amount of systematic and structured instruction is needed in order to acquire basic skills in these subject areas. As a result most countries have favoured partial integration although the extent of integration varies from country to country.

In India, curricula are integrated around natural and social aspects of environment. There is a single subject of environmental studies covered in grades I and II. The same studies are presented in two subject areas under to names of general science and social studies in grades III-V. Further intensive work in developing integrated curricula is being done under the project Primary Education Curriculum Renewal (PECR), where efforts are being made to integrate various aspects of the children's environment - natural as well as social into different areas of learning like languages, mathematics, environmental studies, productive work, health education and creative activities. Attempts are also being made to integrate various subject areas partially or wholly. This project (PECR) has been emulated in most Indian States with varied experiences. Thus while in some States the integration of subjects is partial, the union territory of Delhi has attempted to integrate all the subjects.

The Republic of Korea adopted integrated curriculum for grades I and II beginning the first semester 1982. The newly developed and disseminated programmes are "We are the first graders" for the first one month programme of the school session, "Daily life" and "Pleasant life" for grade I and II, and "Inquiring life" for grade I. The programme, "We are the first graders" is designed to orient the children to adjust themselves to school life and to the forthcoming learning. This programme is developed as a full integrated pattern, in which subject identity does not appear. The programme "Daily life (Disciplined life)" is integrated from the subject areas of moral education, Korean language, and social studies, while "Pleasant life" has emerged from the existing subject areas of physical education, music, and fine arts. "Inquiring life" is a programme designed to integrate arithmetic and science. All these four integrated programmes are very innovative ones because hitherto subject-centered education has been prevalent for long time in the Republic Korea. Follow up survey conducted in 1982 by Korean Educational Development Institute, reveals that the integrated curriculum approach has been accepted with great satisfaction by students, teachers, and parents in the Republic.

Nepal has also adopted total integration of curriculum in grade I. The philosophy behind this is that the schools are not separate institutions but pleasant extensions of the home that flourish in the traditions and heritage of the society.

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This approach is meant to help the children develop balanced personalities. The theme generating this idea is "The child and his environment".

In Malaysia, the integrated approach is developed around the model "understanding of the environment". Here language and mathematics are not integrated as such but activities developed under this approach are used to reinforce both language and numerical abilities. In grades IV, V and VI "Man and his environment" is essentially to develop the children's understanding and sensitivity to selected environmental problems.

Thailand has undertaken an integration of subjects known as "Life experiences" wherein the contents of social studies, natural sciences and health education have been totally integrated. The philosophy is to equip the children to learn to solve social and real life problems through the integration of knowledge and experiences. Thailand has also developed another form of integration across subject areas and grade levels to help teachers teach multiple classes more effectively.

Sri Lanka introduced the sequential expansion of integrated curriculum by grade in 1974 and having obtained the desired expansion has now attempted to achieve qualitative improvement. As the need for a curriculum revision was highlighted in the White Paper proposal, based on the feed-back of the Educational Reforms Committee, the Curriculum Development Centre is now engaged in the revision of curriculum for years 1 - 13 of school, years 1 - 3 having an integrated approach and years 4-5 a semi-integrated approach.

Bangladesh introduced integrated curriculum in 1977 based on the recommendations of the National Curriculum and Syllabus Committee. The curriculum integration has been understood as combining experiences for the children in relation to their natural and social environment. It involves organisation of content from various related subject areas around the central theme of an introduction to environment. Total integration of some subjects like population education, moral education, aesthetics, natural heritage and culture with general subjects (language and mathematics) has been made in the syllabuses of all the five grades of primary level.

Orientation and training of key personnel

It is the common experience of participating countries that any attempted curriculum renewal or changes in emphases in the teaching of concepts and skills will not succeed without the active participation of all educational personnel involved in the process of change.

The seven country papers presented at the seminar have laid great importance on the organisation and development of effective training programmes for

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the key educational personnel who have the responsibility for planning, design and implementation of integrated curriculum.

Some of the training programmes already embarked on by participating countries appear to be quite comparable where experiences may be shared but there were considerable divergences in terms of training methods and techniques employed, resources made available and sizes and levels of participation.

A review of the training programme, as reported by the participating countries, provides the following patterns :

1. Training by phases:

In this pattern, categories of personnel requiring training are identified (e.g. upper/central level, mid-level and grass-roots level and the training is carried out through different phases. Through this method the number of trained personnel multiply as the training runs into different phases. The upper level comprising the policy makers, planners and the key professionals, are given training in the first phase. The duration of the training is usually 7 - 10 days and the course content emphasizes the understanding of the concept and forms of integration within the broad framework of national goals and aspirations and the implementation strategies to be adopted.

In the second phase, the key professionals trained in the first phase act as trainers. The teacher-educators and the middle level supervisors now form the focal group. The course content includes an in-depth study and analysis of the concepts and encourages the development of training materials for classroom instruction.

In the third phase, head teachers and local education supervisors participate in the training programme and the personnel who were trained in the second phase become the trainers. The course content remains the same as in Phase Two.

In the fourth and last phase of training, teachers form the major group. The content of the integrated curriculum as well as the learning materials are studied in great depth and detail. The head teachers and the local education supervisors assume the role of trainers.

Bangladesh, Republic of Korea and Thailand have followed this practice of training by phases. The pattern is commended to be low cost but precautions are necessary to prevent the training programme from being diluted during the later phases.

2. Training by a national core of key personnel

In this approach, a national core consisting of key personnel in different subject areas is given intensive training for 2 to 3 weeks in content and methodology

Experiences on orientation and training

including enrichment and materials development. These key personnel, on completion of their training, are given the responsibility of providing training to all classroom teachers and headmasters at the state and district levels. The basic texts for this training programme are teachers' guides on all subjects. Along with the usual techniques of lectures, discussions and workshops, audiovisual aids comprising videos of lessons, sample materials, films and slides are used in the training.

The follow-up programme primarily includes visits by the key personnel and state/district education officers. Such visits usually allow classroom teachers and headmasters to discuss the problems they face when implementing the programme in the classroom. In order to assist teachers handle these problems supplementary workshops are held at district level. Malaysia follows this approach. The Republic of Korea adopted this approach but convened a national workshop for the key personnel consisting of policy makers, administrators, teachers and other concerned personnel at the initial phase of the training programme.

3. Decentralized approach

In this approach two different operational models for training of teachers have been developed in Bangladesh, India, Malaysia, Nepal, Sri Lanka and Thailand. This model is known as the *decentralized approach* which is designed to uplift the knowledge-base of the classroom teachers in integrated curriculum. Here the lower level supervisors and teacher trainers are given training at the initial phase and they in turn impart training to the selected school teachers. In the other model, the selected trained teachers play a final role in in-service teacher training by disseminating their knowledge and skills to their colleagues.

The cluster-based training programme, a decentralized form of training developed in Bangladesh, aims to improve the competencies of classroom teachers in teaching the integrated learning content of different subjects. This is practised in 40 subdistricts of the country under an experimental UPE project. In this training programme, the local education officer organizes recurrent training courses at each school on a group basis for 16 to 25 schools in his cluster. The group training is imparted flexibly according to the needs of the school on a regular schedule by the local education officer. For example, the local education officer may lead training for half the teachers for one hour and the other half for another hour. In another school, the officer may arrange to meet all the teachers as a group before or after school hours.

Teacher leaflets, in modular form, are used to guide the local education officers and teachers in developing their own knowledge and skills. These leaflets are often used alongside the textbook foundation course manual and teachers guides.

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4. Teacher training through mass media

In the Republic of Korea steps were taken to disseminate the concept of integration through mass media, e.g. newspapers, radio, television, and also educational journals. Even though one F.M. radio frequency and one TV channel were especially commissioned for educational purposes a public television channel was utilized to cover the whole nation for massive training to introduce integrated curriculum. In India also, attempts are being made to use TV and radio for mass education. Teacher training is also expected to be conducted through these programmes.

5. The multi-dimensional approach

The training programmes of India and Nepal can be grouped under this heading. Some of the programmes that are conducted in India are:

(i) Orientation of key persons

At the central level, policy-makers and planners discuss the philosophy and operational strategies of the project Primary Education Curriculum Renewal (PECR). This is done at high-level meetings attended by the secretaries, the joint secretaries and the directors of education. In the States, issues related to the project are discussed in the meetings of the Education Secretary with Directors of Education and the Directors of the State Institute of Education State Council of Educational Research and Training. These meetings cover discussions on the philosophy of the project and that of integrated curriculum, operational strategies, roles of various agencies, issues and problems.

(ii) Orientation of state curriculum teams

Each State forms a curriculum team consisting of curriculum material-developers and senior teachers. Week-long seminars on special features of curriculum-renewal are organised for the members of the teams.

(iii) Training of teacher educators

The teacher-educators in this programme mostly belong to specific subject-areas. The content together with the methodology and techniques of evaluation is dealt at length in the training course along with integration aspects.

(iv) Orientation of authors and evaluators of instructional Material

The authors and evaluators of instructional materials are given a brief orientation on the nature and presentation of the content prior to the actual task of writing the material.

Chapter Two

GUIDELINES AND CHECKLISTS ON DEVELOPING TRAINING PROGRAMMES AND MATERIALS

Section A : Guidelines and Checklists on training programmes

The concept of an integrated curriculum at the primary level as evident in the previous chapter is taking strong roots among participating countries, although the policies and practices in terms of implementation may vary between them for understandable reasons. However, there is a general consensus that developing a successful orientation and training programme for the key educational personnel charged with the responsibility of planning and implementing the new curriculum programme is a *sine qua non* of the whole activities.

This chapter presents suggested guidelines and checklists on organization and development of training programmes and materials which will be useful when the member countries embark on developing their own orientation and training programmes.

Following in-depth discussions about the organization and development of effective training programmes, the major topics were identified as : (i) analysis of training needs; (ii) formulation of objectives, (iii) identification of target groups for training; (iv) selection of content; (v) methodology to be adopted for the training programme. (vi) agencies to be involved, (vii) evaluation strategies, (viii) monitoring of the training programme; and (ix) follow-up activities.

1. Analysis of training needs

Guidelines.

In formulating an effective training programme for key educational personnel the initial step should be the assessment of training needs both from national and individual/group points of view. The training needs are to be identified within the framework of the total educational aspects of the programme on integration of curriculum.

- (a) *National training needs.* From the macro perspective of national needs the essential elements will obviously be the development of the necessary knowledge, skill and attitudes of the concerned personnel for designing developing and implementing the integrated curriculum.

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- (b) *Individual/group training needs.* Within the whole process of curriculum implementation officials and specialists from different agencies and tiers will be required to play specific roles. Therefore both the level as well as the nature of training needs will vary from one group to another. Similarly, within the same group the training needs of the individuals may not be the same because of the individual differences in knowledge, skill and attitude that are likely to exist in the group. From this perspective, careful attention needs to be given to the assessment of actual training needs of the group and each individual within the group.
- (c) *Training needs in consideration of the programme itself.* Keeping in view the entire programme of curricular integration, each training programme has to be organized in such a way that the basic requisites such as proper venue and timetable, adequate instructional arrangements, support services, evaluation and follow-up arrangements can be fulfilled in the course of the programme.

Checklist A

What are the needs of orientation/training of key personnel for integrated curriculum :

- i) _____ national training needs;
- ii) _____ individual and group needs (teachers, parents, curriculum specialists group); and
- iii) _____ training needs from integrated curriculum?

2. Formulation of objectives

Guidelines

The objectives of the training programme are to be set out in the context of the training needs. The objectives may be broadly categorized as (a) General objectives; and (b) Specific objectives.

- (a) *General objectives.* These are the expected outcomes of the training programme in broad terms such as helping the trainees to conceptualize the different aspects of the integrated curriculum programme and its implementation process.
- (b) *Specific objectives.* These are the behavioural objectives such as assisting the participants to know and practice methods for the development of instructional materials, and design and improvise low-cost teaching aids.

Checklist B

What general objectives to be achieved are formulated for the orientation/training programme :

- i) _____ to create an awareness of the integrated approach in the primary school curriculum;
- ii) _____ to develop an understanding of the integrated curriculum among policy makers, administrators, subject-matter specialists and teachers; and
- iii) _____ to stimulate the possibility of seeking educational improvement through the integrated curriculum approach?

What specific objectives to be achieved are formulated for the orientation/training programme :

- i) _____ to develop key concepts in curriculum integration;
- ii) _____ to develop basic competencies in designing an integrated programme;
- iii) _____ to develop basic skills in producing low-cost materials;
- iv) _____ to develop managerial skills in integrated instruction;
- v) _____ to develop positive attitudes toward concrete learning experiences and child centred instruction which are important factors in integrated instruction; and
- vi) _____ to develop process-centered orientation in school education; and
- vii) _____ other.

3. Identification of target groups

Guidelines

Having set out the training objectives the important step is to identify the right types of officials and specialists who will need training. The following four categories may be established to identify the key personnel in the proposed programme :

- (a) *Personnel connected with direct teaching and teaching-support services.* These personnel are classroom teacher, teacher supervisors/counsellors; and field level teacher trainers.
- (b) *Professionals connected with curriculum development and curriculum implementation services.* They are curriculum designers, developers of instructional and related materials, curriculum evaluators, key teacher educators/trainers, concerned specialists of

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educational technology and special researchers of integrated curriculum.

(c) *Officials connected with policy-making, administrative and managerial services. These officials are :*

Higher level - Educational planners

- Administrators of the Education Ministries and line directorates

Mid-level - Primary education officers of administrative districts and sub-districts

Grass-roots level - Head teachers of schools

- School inspectors

(d) *Persons involved in services promoting linkages between educational institutions and the community. These people are parents, community leaders, members of Parent Teacher Associations, School Management Committees, members of local government, extension agents of village development programmes, and concerned officials from the mass-media (e.g. radio and T.V.)*

Checklist C

What are the target personnel for an integrated curriculum training programme?

Personnel connected with direct teaching and teaching-support services, such as :

- i) _____ classroom teachers;
- ii) _____ teacher supervisors/counsellors; and
- iii) _____ field level teacher trainers.

Professionals connected with curriculum development and curriculum implementation services, such as :

- i) _____ curriculum designers;
- ii) _____ developers of instructional and related materials;
- iii) _____ curriculum evaluators;
- iv) _____ key teacher educators/trainers;
- v) _____ concerned specialists of educational technology; and
- vi) _____ special researchers of integrated curriculum.

Officials connected with policy-making, administrative and managerial services; such as :

- (a) *Higher level. Educational planners and administrators of the Education Ministries and line directorates;*
- (b) *Middle-level. Primary education officers of administrative and districts and sub-districts;*

(c) *Grass-roots level.* Head teachers of schools and school inspectors.

Persons involved in services promoting linkages between educational institutions and the community, such as :

- i) _____ parents;
- ii) _____ community leaders;
- iii) _____ members of Parent Teacher Associations and School Management Committees;
- iv) _____ Members of Local Governments;
- v) _____ extension agents of village development programmes;
- and
- vii) _____ concerned officials from the mass-media (e.g. radio and T.V.)

4. Selection of contents of the training programme

Guidelines

Integrated curriculum is new to most countries in Asia and the introduction of such innovation cannot be successful without appropriately prepared personnel (teachers, teacher educators, policy makers,) with the necessary knowledge required to implement it.

Since implementation strategies involve the use of local resources, appropriate technology, low-cost instructional materials and other instructional media; community participation and the involvement of outside agencies as well as other related supporting services are also necessary. It is imperative that the implementors are familiar with these strategies and that training programmes include their theory and practice.

Personnel in administrative posts should also learn about the kinds of logistic support they should provide to teachers and other personnel involved in implementing the curriculum.

Considering the above, the following are some suggestions on content to be considered for inclusion in the orientation training programmes :

- (a) Concept and/or meaning of curriculum integration;
- (b) Rationale for curriculum integration;
- (c) Clear educational goals of the integrated curriculum;
- (d) Patterns of curriculum integration;
- (e) Design of integrated instruction;
- (f) Teaching/learning in an integrated curriculum;
- (g) School and/or classroom management in curriculum integration;
- (h) Preparation and use of instructional materials; and
- (i) Evaluation of curriculum integration

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Checklist D

What forms of curriculum integration will be employed:

- i) _____ total versus partial integration;
- ii) _____ horizontal versus vertical integration;
- iii) _____ inter-, multi-, and extra-disciplinary;
- iv) _____ integration of learning;
- v) _____ integration of teaching; and
- vi) _____ other?

What dimensions of curriculum integration will be employed :

- i) _____ integration of knowledge with learning;
- ii) _____ integration of cognitive and affective learning;
- iii) _____ integration of knowledge and behaviour;
- iv) _____ integration of learning with life of the child outside the classroom;
- v) _____ integration of subject areas and basics;
- vi) _____ integration of themes and projects; and
- vii) _____ other?

What rationale is established in integrated curriculum:

- i) _____ philosophical (epistemological);
- ii) _____ sociological;
- iii) _____ psychological (development);
- iv) _____ practical; and
- v) _____ other ?

What overall educational goals are intended to be achieved:

- i) _____ balanced development of child's personality;
- ii) _____ child-centered learning;
- iii) _____ co-operative attitude toward learning and others;
- iv) _____ positive attitude towards learning;
- v) _____ positive self-concept; and
- vi) _____ other ?

What specific educational goals are intended to be achieved:

- i) _____ course-specific objectives;
- ii) _____ unit-specific objectives;
- iii) _____ project-specific objectives; and
- iv) _____ other ?

What patterns of curriculum integration are introduced:

- i) _____ thematic approach;

- ii) _____ project approach;
- iii) _____ problem centered approach;
- iv) _____ interest centered approach;
- v) _____ broad field approach;
- vi) _____ core curriculum approach;
- vii) _____ life centered approach;
- viii) _____ inquiry skill centered approach; and
- ix) _____ other ?

What methods are included in the design of integrated instruction:

- i) _____ activity oriented instruction;
- ii) _____ process oriented instruction-simulation;
- iii) _____ content analysis;
- iv) _____ creative learning;
- v) _____ group programmes;
- vi) _____ inquiring learning;
- vii) _____ role playing approach;
- viii) _____ flexible time-schedule;
- ix) _____ team teaching;
- x) _____ use of multi-media; and
- xi) _____ other ?

What principles are included in teaching and learning in an integrated curriculum:

- i) _____ creative on the part of the teacher;
- ii) _____ co-operative;
- iii) _____ facilitating learning; and
- iv) _____ other ?

For school and/or classroom management, what topics are provided:

- i) _____ supportive to classroom learning;
- ii) _____ informal relationship; and
- iii) _____ other ?

What are the major topics for preparation and use of instructional materials :

- i) _____ low cost material;
- ii) _____ teacher made material;
- iii) _____ use of community as learning resource;
- iv) _____ use of teaching/learning material resource centre; and
- v) _____ other ?

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What items are included in the evaluation ?

- i) _____ process oriented evaluation including:
 - _____ observation checklists on,
 - _____ degree of participation,
 - _____ degree of co-operation,
 - _____ degree of volunteering,
 - _____ case study,
 - _____ anecdote analysis;
- ii) _____ diagnostic evaluation;
- iii) _____ formative evaluation;
- iv) _____ summative evaluation;
- v) _____ evaluation of teacher instruction;
- vi) _____ evaluation of curriculum;
- vii) _____ development of test item;
- viii) _____ other ?

5. Methodology to be adopted in orientation/training programmes

Guidelines

The orientation/training programmes at all levels should not only aim at developing clearer understanding of the concept and process of integrated curriculum but should also be able to infuse among the participants a sense of commitment to the total approach of integration. In order to make the orientation/training programme effective it is suggested that the following methodology is used:

- a) The lectures and talks should be minimal. Full scope for participation and discussion should be given to the participants. This would develop a sense of involvement in the programme and would thus create a sense of commitment.
- b) While conducting training programmes, practical demonstrations and simulation exercises should be taken up whenever possible. It will be ideal if training programmes are conducted in such a way that the participants themselves are able to do the actual exercises with the help of the new methodology they have developed.
- c) During the programme of training emphasis should be given on self-study and working in small groups in development related materials. Some participants feel freer in smaller groups. Besides smaller groups provide greater scope for self-expression.
- d) It will be useful if during the training programmes the trainees are able to develop sample materials which they may use either on an experimental basis or on a long term basis. Opportunities may also be given to try out the sample materials in actual situations or through simulation exercises.

e) Both from pedagogic and practical points of view it would be useful if field trips related to specific topics of training are organized in the earlier part of the training programme so as to enable the trainees to become sensitized to the realities of the situation. It is important that new methodologies developed should take into account the existing conditions within which the concerned participants have to work.

f) During the course of the training programme individual participants should be encouraged to go into in-depth analysis of the issues relating to their area of training. As a result of this exercise, participants may bring home interesting findings which may be used for devising a future course of action.

g) Training programmes can also be conducted through correspondence-cum-contact methods. In certain situations it may become difficult to invite a large number of participants to a single programme of a longer duration. Correspondence lessons with the use of answer sheets and corrective measures may be helpful to obviate this difficulty.

h) The use of T.V. and Radio has proved to be an important method of training especially when a large number of personnel throughout the country are required to be trained.

i) Video cassettes and slides can also be effectively used in making the programme successful.

j) Training strategy should be determined on the following considerations: (i) system change; (ii) replaceability; (iii) evaluation scheme; (iv) manageability; and (v) cost.

Before the actual programme is organized a great deal of preparatory work may have to be accomplished. The following steps are suggested:

- i) Clearly define the objectives and scope of the programme;
- ii) Select a venue and suitable time;
- iii) Select participants and send invitations to them well in time;
- iv) Select specialists to work as resource persons and invite them well in time;
- v) Prepare working documents and other necessary materials and despatch to the participants in advance;
- vi) Prepare a tentative daily programme and despatch it to the participants and resource persons;
- vii) Make suitable arrangements for accommodation of the participants and resource persons;
- viii) Procure stationery and other materials to be used in the programme in advance;
- ix) Make arrangements for holding general and group sessions;
- x) Assign various kinds of duties to the members of the staff of the organizing agency for administrative arrangements and conduct of the course; and

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- xi) Assign the duties of taking minutes, preparation of reports, and related functions of the course.

When the actual programme is conducted, the organizers should ensure that the activities run smoothly. The following are some useful hints:

- i) Register the participants at the venue of the workshop and prepare the list of participants;
- ii) Appoint the chairman and reporteur for each session ensuring that the proceedings are regularly prepared;
- iii) Ensure that group work is properly done;
- iv) Distribute the required reading materials, stationery etc. in time;
- v) Present the reports in final session and distribute the materials produced, if any, at the end of the programme; and
- vi) Provide per diem to the participants in advance.

Checklist E

Do the methods adopted during the training programme emphasize:

- i) _____ optimal use of discussions;
- ii) _____ active participation by the participants;
- iii) _____ working in smaller groups;
- iv) _____ practical demonstration of new methods;
- v) _____ simulation exercises or actual exercises in real situations;
- vi) _____ self-study by the participants;
- vii) _____ production of materials by the participants;
- viii) _____ organisation of field trips to survey the actual situations;
- ix) _____ in-depth studies of major issues related to the areas of the training; and
- x) _____ use of audio-visual aids ?

6. Agencies to be involved

Guidelines

In the process of implementing the integrated curriculum programme a number of agencies may need to be involved to ensure its success. Some of these agencies may again play the dual role of providing both the trainers as well as trainees. The following is a list of various agencies that are likely to be involved in one way or another:

a) *Teaching and learning activities*, schools provide teaching/learning situations and give direct access to teachers and students. The supervising unit provides guidance and evaluation services.

b) *Professional support.* Professional support services cover such agencies as curriculum development centre, teacher education institutions, higher education institutions/faculty of education, training and research institutions in Ministry of Education and international agencies concerned.

c) *Administrative support.* Adminstrative support covers such agencies as Directorates of Education, planning office in the Ministry of Education, local education offices and local government administration agencies.

d) *Promotion of inter-active relation between education and society.*

This may include mass media network, curriculum materials producers, community agencies, e.g. Parent Teachers Associations, Community Resource Centres, persons with special knowledge on a particular subject, and persons with special knowledge in a particular skill.

Checklist F

Are appropriate human resources involved to: support the orientation/training programme.

a) From supervisory and professional staff-

- i) _____ guidance
- ii) _____ supervision
- iii) _____ evaluation
- iv) _____ other professional resources

b) Community resources

- i) _____ village as whole
- ii) _____ post office, bus terminal, historical places, etc.
- iii) _____ P T A S
- iv) _____ local authority
- v) _____ specialists on particular skills.

c) Low cost Material

- i) _____ raw material
- ii) _____ developed materials

d) Material resources

- i) _____ Printed materials like syllabus, course of studies textbooks, teachers handbook, supplementary reading material discussion papers, training manuals, etc.
- ii) _____ Audiovisual aids
 - T.V. Radio, slides, overhead projectors, cassettes etc.

e) Material resources

- i) _____ plants, animals, ponds, rivers, hills. etc.

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7. Evaluation strategies

Guidelines

The three essential components of this strategy are what to evaluate in the training programme, how to evaluate it and who should carry it out.

What to evaluate

a) Context

Factors that are not directly related to training, but which may significantly influence its effectiveness. For example, secretarial assistance to an effective training programme.

b) Inputs

Training complements the curriculum, the syllabus - the contents.

c) Process

In all discussions of training evaluation the most neglected area seems to be the training process which can hardly be covered by training inputs alone. The environment of the training organizations, the relationships between participants and trainers, the general attitudes and approaches of the trainers and the trainees, are very important aspects determining the success of a training programme. Evaluation of training process, therefore, should constitute an important element.

d) Outcomes

The results of training in terms of better understanding, behavioural change or improved practices in the organization or training.

Thus evaluation may have four elements. (i) evaluation of contextual factors, (ii) evaluation of training inputs, (iii) evaluation of training process, and (iv) evaluation of training outcomes.

Areas of evaluation

- a) Pre-workshop factors**
 - Preparation
 - Learning motivation
 - Expectation

Elements

Context

Guidelines and checklists

Areas of evaluation	Elements
b) Training events and activities <ul style="list-style-type: none">- Curriculum including strategy- Specific events- Specific sessions	Input
c) organization arrangement <ul style="list-style-type: none">- Areas of satisfaction/dissatisfaction- Training facilities- Other facilities	Context
d) Training process <ul style="list-style-type: none">- Learning environment- Training methods- Effectiveness of training	Process
e) Participant development <ul style="list-style-type: none">- Conceptual development- Learning of new skills- Change in values/attitudes- Change in behaviour- Application	Outcome
f) Post-workshop factor <ul style="list-style-type: none">- Support to follow-up activities- Organizational factors facilitating use of training	Context

How to evaluate

This involves the aspects of. (i) the overall design of evaluation, and (ii) the specific techniques to use in evaluating training

On the evaluation strategy, the following checklists are developed.

Checklist G

How well was the training carried out ? Criterion question:

- i) _____ Were the scheduled activities and events implemented on time ?
- ii) _____ Was training carried out as planned ?
- iii) _____ To what extent were trainees co-operative, motivated, and satisfied with the training ?
- iv) _____ Were available resources and facilities adequate and fully used ?

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- v) _____ Did the trainers seem to know their subject well and possess expertise as trainers ?
- vi) _____ Were the training materials prepared during the training period as scheduled ?
- vii) _____ Did the programme specialists in training seem competent in managing the course and handling unforeseen events ?
- viii) _____ Were the delivery methods used the most suitable for the particular topic or content area ?

Who carries out the evaluation ?

Many agencies are involved in conducting a training programme. There is, however, a principal agency which is made responsible for organizing and conducting the training programme. This agency has to play a primary role in evaluating the outcome of the programme. The administrators may also undertake either their own committees and/or assign the work to any external agency. In the conduct of the programme other agencies/personnel are assigned some role. These agencies/personnel have to assess what extent they have been successful in achieving their objectives. The other group whose evaluation is very significant is the group of trainees. They should be provided an opportunity to express their reaction and opinion about the various aspects of the programme.

Checklist H

Which agencies/personnel are involved in evaluating the training programme:

- i) _____ the administrator;
- ii) _____ the external agency;
- iii) _____ the organizers of the programme;
- iv) _____ the resource persons (curriculum specialists, subject specialists, authors, etc.), or
- v) _____ the participants ?

Checklist I

Checklist for participants.

Were the objective of the training session clear ?

- i) _____ clear
- ii) _____ clear to some extent
- iii) _____ not clear

Did you know in advance what preparations were required for the training session ?

- i) _____ yes
- ii) _____ no

Did you prepare for the class as required?

- i) _____ yes, fully
- ii) _____ yes, somewhat
- iii) _____ not at all

Rate the training session on the following dimensions (Check one of the alternatives from each)

Appropriateness of teaching method used for this topic:

- i) _____ very appropriate
- ii) _____ somewhat appropriate
- iii) _____ better methods should be searched.

Adequacy of time allotted for the topic:

- i) _____ more than adequate
- ii) _____ adequate
- iii) _____ not adequate
- iv) _____ very inadequate

Teaching style of the teacher:

- i) _____ Directive and authentic
- ii) _____ non-directive but authentic
- iii) _____ non-directive and had no control over class
- iv) _____ directive and discouraging participation
- v) _____ any other

Scope given to trainees to participate:

- i) _____ enough opportunity was given and efforts were made by teachers
- ii) _____ some opportunity was given
- iii) _____ not sufficient opportunity was given
- iv) _____ any other

Communication of teachers:

- i) _____ very clear
- ii) _____ somewhat clear
- iii) _____ not so clear
- iv) _____ poor

Summarising:

- i) _____ topics and discussions were summarised at the end
- ii) _____ not summarised

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8. Monitoring of the training Programmes

Guideline

When the training programme is in process it is essential that the organisers have a close watch on its progress. During the sessions and after the session each day the organisers have to attend to every minute detail of the programme. The physical arrangements and the academic aspects of the programme have to be looked into very attentively. It is desirable that at the close of each session the organisers have a brief meeting with the participants and ask them about their requirements both in the sessions and at the place of their stay. The next day programme may be chalked out and details given to the participants. The agenda and the daily time-table should be a source of guidance for monitoring the programme. Wherever any shortcoming or lapses are found, immediate corrective measures may be taken so that the programme runs smoothly.

Checklist J

The following aspects of the programme should be examined regularly by the organizers of the programme:

- i) _____ Programme starting on time ?
- ii) _____ Chairman and rapporteurs of the session requested to take chair as per earlier decision ?
- iii) _____ Arrangements of seating properly done ?
- iv) _____ Necessary reading material distributed on time ?
- v) _____ Typing facilities provided ?
- vi) _____ Materials like blank paper, pins, pens etc. provided to the participants ?
- vii) _____ Transport arrangements, if necessary made for the participants ?
- viii) _____ Arrangement of water, tea/coffee, refreshment etc. made.
- ix) _____ Information to the resource person, if any for his programme sent on time ?
- x) _____ Complaints of the participants about their accommodation arrangements, if any, attended to promptly ?
- xi) _____ During the session proper are methods being adopted ?
- xii) _____ Are participants motivated to participate in discussions and in the work ?
- xiii) _____ Facilities provided to the participants for group discussion and work ?
- xiv) _____ Arrangements to invite important personalities to the opening and closing sessions ?
- xv) _____ Arrangements for bringing out the report of the programme made ?

9. Follow-up activities

Guidelines

One frequently forgotten action is the follow-up exercise after the completion of the training. The follow-up activity helps the organisers in many useful ways.

- a) The organisers get feed back to improve the methodology of training;
- b) A rapport is developed between trainers and the trainees;
- c) Real evaluation of the training takes place when the ideas and methodology are tested in the field; and
- d) Opportunities are provided for further guidance to the trainees.

The integrated curriculum is an innovative approach; it questions the validity of the traditional subject-based approach. In the beginning the idea is not palatable and there may be resistance both from the teachers and parents. It is therefore, necessary that they feel convinced of the need to accept this new approach. While training and orientation play an important role, the follow up to this training and further work are necessary for the effective implementation of the innovative approach. If it is not done there is a genuine fear that the training may lapse.

Checklist K

- i) _____ Send the reports of the training to the participants, curriculum developers, policy makers and administrators.
- ii) _____ Send letter of thanks to the participants and to the heads of agencies who deputed them.
- iii) _____ Prepare a questionnaire and send these to receive feed-back.
- iv) _____ Request participants periodically to send their experiences.
- v) _____ Visit the field and see the actual implementation of the curriculum to understand the problems and issues involved in the implementation.
- vi) _____ Provide on-the-spot guidance to the implementors of the curriculum.
- vii) _____ Improve the content and methodology of the training programme in the light of the feed-back.
- viii) _____ Maintain continuous contact with the participants through correspondence and provide guidance.
- ix) _____ Maintain continuous contact with the administrators and policy makers to provide supportive services.

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Section B: Guidelines and checklists on development of materials

The following materials are generally used during the training programmes organised in connection with the implementation of integrated curriculum :

- a) Training manuals
- b) Instructional modules
- c) Teacher leaflets
- d) Teacher guides
- e) Instructional plan

Training manuals are specifically designed for training purposes. These may be developed to train a single category of personnel or may be of a general nature to be used for various categories of personnel. The manuals prepared for the training of personnel associated with the implementation of integrated curriculum generally include discussion on nature and scope of a integrated curriculum, the need of integrated curriculum, the various forms of integrated curriculum, process of development of integrated curriculum and managerial and supervisory aspects of implementation of integrated curriculum. The role of various personnel and operational strategies of implementation would also be discussed in the manual. The manual also may include illustrative, integrated materials of various types.

Instructional modules are another type of training materials used by the organizers of a training programme. A module is flexible in its approach in terms of time taken and also in terms of catering to the individual needs of the trainees. It generally includes topics statement prerequisites, objectives pre-assessment procedures, instructional activities and post-assessment procedures. In the case of training modules dealing with integrated curriculum, topics related to integrated curriculum are selected and guidance is provided as to how the trainees will deal with them. For instance a module like 'use of natural environment in developing integrated curriculum' will explain the objectives, content, methodology and evaluation procedures for this approach.

Teacher leaflets are low-cost materials covering only two to four printed pages. Each leaflet provides guidance on one issue-maybe a problem related to school management or a school programme or teaching of a particular unit. The guidelines are brief, to the point and written in simple language that is easily comprehensible to the teachers. It may contain illustrations also. These leaflets can be of great use for on-the-spot training particularly of inspectors and teachers who are involved in the implementation of integrated curriculum. Such issues like integrating environment with learning experiences may be dealt with separately in leaflets.

The teachers guide is an exhaustive compendium generally containing an introductory note, objectives, syllabus (curriculum specifications), teaching learning strategies and evaluation procedures. It also includes illustrative units if it is not based on a particular textbook. In case it is a part of textbooks, guidelines for all the units/lessons are included in it. Under each unit, objectives, content, teaching-learning activities and evaluation procedures are included. Each unit may also include enrichment material. There can be subject-wise teacher guides or there can be one guide containing guidance for all the subjects. A single guide is generally preferred for the programmes of integrated curriculum. The guide prepared for the integrated curriculum explains the philosophy and need of having an integrated curriculum. It also explains various forms of the integrated curriculum and the process of its development. The units in it provide guidance to undertake programmes based on the integrated approach. Essentially developed for the use of teachers these guides are also used by the trainees in conducting training programmes of teachers, inspectors and supervisors.

An instructional plan generally deals with one unit of teaching. It is often extracted from the teachers guide. The plan is helpful to the organisers in conducting the training programme. Instead of introducing the whole teachers guide at a time the organisers select a few units from the guide, get them duplicated and distribute them among the participants for discussion.

Check list, I.

Before taking a decision to develop instructional materials the organisers should find out about :

- i) _____ the existing material available;
- ii) _____ The personnel available - curriculum specialist;
- subject specialist;
- target group representative;
- iii) _____ the needs of the target group;
- iv) _____ the background of the target group;
- v) _____ the funds available for printing/mimeographing.

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The following factors may be taken into consideration while developing the materials.

1. Format of the material should be clearly laid out.

Check list M

Will the material include;

- i) _____ an introduction explaining the general objectives of each course/subject, nature and scope of the course subject, methodology, evaluation procedure and purpose of the material?
- ii) _____ course contents/syllabus?
- iii) _____ unitwise description including - specific objectives?
 - content?
 - methodology?
 - evaluation?
 - enrichment material?
- iv) _____ material for further reading?

2. The introductory note should indicate precisely the purpose of the material, the personnel for whom it is intended, the use that will be made of it.

3. The expected learning outcome as a result of the training programme should invariably be stated in terms of behavioural objectives related to the cognitive, affective and psychomotor domain in training modules and instructional plans.

4. The content included in the material should be at the appropriate level of the learners' understanding taking into account their background and abilities.

5. Information, facts and opinions included in the content should be accurate and authentic.

6. Relevant examples from the learners' environment and from their previous knowledge may be included to make the material meaningful.

7. Long narrations and descriptions should be avoided. In the text itself stimulating questions should be raised to arouse the curiosity of the learners and encourage their participation and involvement. The style of presentation should be such that it sustains the interest of the learners. Self learning devices should also be included wherever possible.

8. The presentation should encourage the learners to raise questions rather than to memorise the information. The development of a spirit of inquiry should be aroused through the presentation.

Guidelines and checklists

9. The presentation should be made attractive by underlining the key points, giving headings and sub-heading and using colour to distinguish separate sections.

10. Illustrations make materials attractive even to adults. Suitable and appropriate illustrations, preferably in colour, should be included in the material.

11. The language should be simple and crisp-long and complex sentences should be avoided. Flowery and ambiguous language may confuse the learners. However it should not be of a standard below that of the learners. The learners should not feel that they are being treated as young children.

12. The organisation should be in a logical sequence giving a coherent and compact picture of the subject-matter.

13. The material should include the list of materials for further reading.

14. The material should include devices for self evaluation by the learners.

15. It is always desirable to involve representatives of the target group in the process of development of the materials. It would be useful if they themselves produced the specific material that is going to be used by them or by the persons belonging to their category.

16. It is essential to get the materials evaluated by experts and representatives of learners before these are finalised. When the first draft is ready it should be thrown open to discussion by the concerned experts and other personnel. The material should also be tried out in actual situations. The opinions and reactions of experts and of those who try out the materials will be of immense use in improving the quality of materials.

The above stated guidelines need not be applicable to all type of material. The writers may see the relevance and chose the ones applicable to their material.

The writers of the materials should satisfy themselves with the quality of the material.

Check List N.

Is the material satisfactory in respect of its:

i) _____ format and layout that is logical ?

_____ well organised ?

_____ well spaced ?

ii) _____ precise statement of purposes of the material and the nature and scope of the course ?

iii) _____ identification of learning outcome in terms of behavioural changes that are related to

_____ cognitive domain ?

_____ affective domain ?

_____ psychomotor domain ?

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- iv) _____ precise statement of syllabus (course content) ?
- v) _____ selection of content appropriate to the level of learners ?
- vi) _____ accuracy of facts, opinions and generalisations ?
- vii) _____ use of language appropriate to the level of learners ?
- viii) _____ attractiveness by including appropriate illustrations by underling the points of emphasis and by dividing sections through different colour ?
- ix) _____ motivation of learners to react and raise questions rather than memorise the information ?
- x) _____ provision of situations for self-learning and self-study ?
- xi) _____ inclusion of examples from the environment of the learner and them his previous knowledge ?
- xii) _____ organization of the subject matter within chapters/units that is logical and well sequenced ?
- xiii) _____ inclusion of devices for self-evaluation ?
- xiv) _____ inclusion of a list of materials for further reading ?

The above check-list can also be used by experts and consultants when they evaluate the material. It can also be used by those who try-out the materials. The check list can be modified according to the needs and requirements of the evaluators of the materials.

Chapter Three
SELECTED EXEMPLAR MATERIALS

The Sub-Regional Seminar reviewed, discussed and improved the materials based on the suggestions given. Table 1 shows the four categories into which the exemplars are classified, the topic, the target audience the application in terms of pre-service and in-service education and the country of origin.

Each of the revised exemplar materials is presented in this chapter. The order of presentation follows the categories of the materials as per country of origin as shown in Table 1. The materials were all reviewed and refined by the group before inclusion in the chapter.

Table 1 Distinguishing characteristics

Category	Topic	Target audience			Application		Country of Origin
		Student teacher	Teacher, Teacher educator and curriculum developer	Others	Pre-Service	In-Service	
1. Training manual	Teaching pleasant life	V	V	V	V	V	Republic of Korea.
2. Instructional modules	Utilization of local community resources and low-cost instructional materials	V	V	V	V	V	Republic of Korea.
	How to ask questions : Development of questioning skills in environmental studies	V	V		V	V	Nepal

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Table 1 Distinguishing characteristics (cont'd)

Category	Topic	Target audience			Application		Country of Origin
		Student teacher	Teacher, Teacher educator and curriculum developer	Others	Pre-Service	In-Service	
3. Teacher leaflet	Concepts, principles and the integrated curriculum	V	V	V	V	V	Republic of Korea.
	Improving pupil enrolment	V	V	V	V	V	Bangladesh
	Encouraging Community participation in your school	V	V	V	V	V	Bangladesh
	Preparing an individual lesson	V	V	V	V	V	Bangladesh
	Identifying and helping physically handicapped students	V	V	V	V	V	Bangladesh
4. Teachers guide	Food	V	V		V	V	India
	Good manners, health and safety habits	V	V		V	V	India
	Life of plants and animals	V	V		V	V	India
5. Instructional plan	Receiving guests	V	V		V	V	Thailand
	Food	V	V		V	V	Thailand

Training Manual

Country : Republic of Korea

Subject/Topic : Teaching 'Pleasant Life' (grade I, Semester I)

Reported by : Dr. Byong-Sun Kwak

Introduction

The textbook for 'Pleasant Life' comprises the familiar games and creative activities that children engage in daily. The topics are designed to develop physical and mental health and creative sensitivity.

The textbook details the goals and content of the three subjects that make up this programme; physical education, music and fine arts. Creativity, self-expression and appreciation of music and art and the joy of movement receive emphasis.

Both the textbook and teacher's guide are arranged in topics drawn from daily activities including perceived and imaginary things, self and others, plants, animals, matter and social events. These topics are arranged sequentially according to the pupils experiences and interest. Topic length averages six hours but this varies according to the nature and characteristics of each topic.

The topics cover physical activity, emotional expression, model making and thinking and comprehension activities. They bring physical education, music and fine arts into a single context always keeping in mind the main stream of activity.

The teacher's guide makes use of pictures and photographs to illustrate techniques and procedures. Stories and directions relevant to learning content and activities are presented from the second semester of the first year.

The teacher's guide for pleasant life comprises two parts:

Part I : characteristics, goals and content, principles and semester plan; and

Part II : overview and objectives of each topic, teaching plan, equipment, development of instruction and references relating to the planning stage for each class period.

Principles of compilation focusing on the content, involved in the teaching practice of Part II are presented as follows:

1. Instructional plan

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The instructional plan is developed to provide general understanding of the whole content of a topic for its effective presentation.

- a) Overview : The rationale for the selection of a topic, an overview of learning content and activities and notes or cautions in teaching a topic are explained here. Selected topics are relevant to the pupil's psychological and physical development and learning behaviour. The themes of experiences and events are explained and the rationale for selecting the topic is clarified. The overview of learning content highlights the activities and main ideas the topic is to develop in pupils on an intellectual, technical and emotional basis.
- b) Objectives : The objectives specify behavioural changes expected as a result of the integrated approach.
In establishing objectives, performative (technical) and affective aspects are emphasized. While 'Daily Life' and 'Inquiring Life' focus on intellectual and affective aspects, the basic intention of 'Pleasant Life' is to promote pupils' psychological and physical development by enabling them to find pleasure in performing and expressing themselves freely.
- c) Teaching plan : This suggests the time allotment for a given topic, the main learning content and activities per class period.

2. Plan for class period

The plan for each class period is a concrete description of the content and teaching-learning activities. It is composed of instructional objectives, equipment, guidelines for instructional development and references.

- a) Instructional objectives : The two or three behavioural objectives, which pupils are expected to develop per class period are described from the perspective of the pupil.
- b) Equipment : This clarifies the necessary facilities, teaching materials and instruments as well as things which pupils should prepare for themselves.
- c) Guideline of instructional development : This suggests the whole teaching-learning content and activities conducted to achieve instructional objectives.

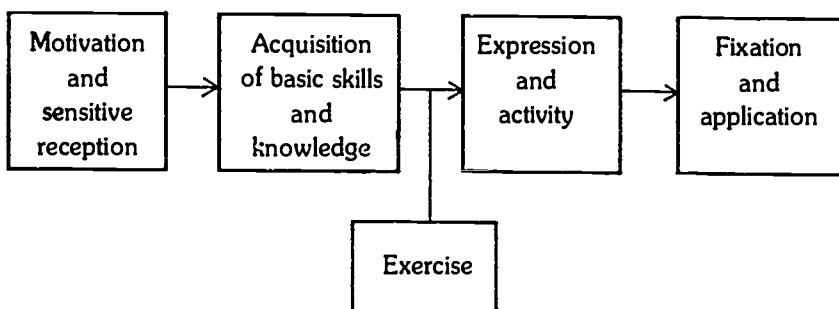
It is divided into two columns; one, for teaching content and activities, the other, for notes. The first column specifies teacher and pupil activities and how to perform them, as well as teaching content. The second column is for notes of caution required during instructional development and the facts required for safety.

d) Reference : To help teachers further develop topics, additional information and techniques of presentation of specific relevance, are provided as reference material.

3. Guidelines for teaching

a) Planning : Instruction of 'Pleasant Life' is developed with each topic as a special unit. Topics are therefore rendered as units in planning instruction. Once teachers are acquainted with them, they may have to adapt or reorganize the content, giving consideration to the characteristics of the community and pupils and the applicability of the content to instructional practice.

b) Instruction : Instruction of 'Pleasant Life' is learner-centred and the teacher should take the role as an assistant to promote the effective development of pupil's learning activities. The instructional process can be illustrated as follows.



Instructional process of 'Pleasant Life'

1) Motivation and sensitive reception

This is a preparatory step to introduce the procedure of learning inherent in the sub-unit, to enhance the pupils' consciousness of problems and to draw their attention to forthcoming learning tasks. It involves presenting instructional objectives, main learning tasks and activities, and relating them to previous learning and preparing, arranging and examining the teaching-learning materials. Where instruction involves some physical activity, pupils are presented with a demonstration and told of the relationship of the activities with others. Practical experience, listening and observation are the activities used in music and fine arts.

2) Acquisition of basic skills and knowledge :

At this stage there are such activities as drilling basic knowledge and simple techniques, developing imagination and constructing.

It is largely an imitation or repetition of demonstrated activities which facilitates the acquisition of basic skills and knowledge. Comprehensive drilling or

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partial drilling is also needed. Learner-centered activities where pupils get acquainted with content and skills through activities should be emphasized rather than teacher-centered explanatory transmission of knowledge.

3) Expression and activity

This stage is the core of the entire instruction flow and usually requires more time. On the basis of acquired knowledge and skills, pupils express their feelings and engage in activities. Physical activity includes jumping, running, swinging and throwing. In music pupils should express their feelings in the form of musical composition, singing and instrument playing. In fine arts, pupils will express their ideas through shape and colour. Instruction should be directed by pupils, whereby they can engage in activities on their own account.

4) Fixation and application

These activities culminate in performance, discussion and encouraging their continuity outside the classroom.

● Evaluation

It is desirable to set up three levels (excellent, good, sound) for assessing the achievement of the objectives of 'Pleasant Life' at the first grade. As the purpose of establishing pleasant life lies in providing pupils with pleasant experiences in activities, the perspective of evaluation for this integrated area is taken from the expressive and active aspects rather than from the cognitive aspect.

It might be difficult to evaluate expression and activity per every topic. Therefore, while assessment for the subject matter-physical education, music, and fine arts-can be done individually, they need synthesizing by categorizing topic activities into several stages. This can be a formative evaluation of expressive activities as well as a diagnostic test of relevant topics which will follow. The synthesized data also serve as comprehensive evaluation.

● Cautions for teaching

1) The process of the four stages mentioned above should not be taught separately, but related naturally.

2) Themes involved in a topic are often composed of separate physical education-centered activity, music-centered activity, fine arts-centered activity.

In such a case, they should be taught in an integrated form of three subject matters, relating to the contents previously learned. The topic in the first semester of the first graders, for example, 'school', is based, on the previous learning-general information of school-provided in March. During the first class period, pupils learn the thematic song reminding them of the contents previously learned. In the second class period, when learning 'gathering', pupils perform arranged movements, while singing the thematic song which they learned in the first class period. During

Selected exemplar materials

the following class periods the topics are taught with variety relating the activities in physical education, music and fine arts to each other.

3) Pupils at this period find it difficult to understand abstract things. Therefore, teaching-learning activities should make use of demonstration, concrete materials and cases as well as bodily expression.

All the physical education, music, fine arts are activity-oriented. Thus, it is required to encourage pupils to express their own thinking, feelings and desires into an action.

4) Because of their vigorous psychological and physical development, the first graders like movements and activities, but, they feel tired and become exhausted easily. So too high an expectation or long class hours should be avoided so their interest is not lost.

5) Since the purposes of physical education, music and fine arts are to develop healthy bodies and aesthetic minds the pupils should usually be taught with the consideration of emotional and technical (bodily movement) aspects in mind.

6) It is desirable for 'Pleasant Life' to be taught with many stories and activities. As the pupils at this period tend to be ego-centric they need to be provided with many chances to communicate with each other. Moreover, composing pleasant activities in physical education, music, and fine arts with stories, pupils can have chances to express their thoughts with language and action.

7) It is often difficult to complete some of the activities in a topic within an hour. Thus, when making a time-table, such a topic should be placed at the last class hour of the day so that it may be taught flexibly irrespective of school-time.

5) Notes for use of textbook and teacher's guide

A. Use of textbook

1) The textbook suggests the learning elements, topics and units, in the form of activities. When these activities are unsuitable in terms of the characteristics of the community and pupils, they can be adapted providing they contain the same learning elements.

2) The contents of the textbook are presented, when possible, according to the schedule suggested by the teacher's guide. But, in the process of integration there may be a little deviation from the schedule.

B. Use of teacher's guide

1) In developing instruction, teachers should not depend on the teacher's guide only.

2) The teacher's guide is presented as a suggestion for teaching and learning. Therefore, teachers might change instructional plan considering the facilities of

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the school, availability of learning material and the capabilities of pupils. They might also reorganize instructional content by substituting different activities through which the original goals of the topic can be achieved or by lowering their level. In these cases, teachers must read the overview and the goals of the topic and try to maintain the basic spirit.

3) In composing the present teacher's guide the ratio of time allotment for physical, music, and fine arts, parts is 2:2:2. Even though the ratio can be changed depending on the topic from the perspective of a whole school year, this ratio should be obeyed as much as possible.

4) The notes for accompaniment necessary for teaching songs are included in an appendix at the end of the teacher's guide. It would be convenient for teachers to separate this part, to bind it and refer to it in class.

6) Sample semester plan

(The first semester)

Months	Week Order	Topics	Class Period	Activities	Reference
April	1	1. School	1	Singing 'School'	
			2	Gathering, saluting	
			3	Singing and tapping to 'Taeguek Flag'	
			4	Drawing what pupils want to draw	
			5	Dancing 'School'	
			6	Designing a School	
	2	2. Tour to Spring	1	Singing 'Tour to Spring'	
			2, 3	Dancing	
			4	Coloring and Cutting out 'Spring Mound'	
			5	Tapping in double time	
			6	Stamping with things	
			1	Singing 'School Excursion'	
			2	Playing tag	
			3	Tapping in double time	
			4	Drawing 'School Excursion'	
			5	Playing a picnic	
			6	Moulding clay	

Selected exemplar materials

Sample semester plan (cont'd)

(The first semester)

Months	Week Order	Topics	Class Period	Activities	Reference
April	4	4. Telescope play	1 2 3 4 5 6	Singing 'telescope' Making a paper telescope Imitating what pupils saw through a telescope Arranging various things Tapping in quadruple time (big drum playing technique) Playing 'jungle gym'	
May	1	5. When I grow up	1 2 3 4 5 6	Singing 'When I grow up' Drawing 'When I grow up' imaginatively Walking and running along the line Drawing a poster of 'Good children' Playing 'Fairy and A Devil' Playing instruments in rhythm concert	
	2	6. Imitation	1 2 3 4 5	Imitating sounds and figures of animals and nature Imitating sounds and the pose for playing the instrument Making animals with paper card Listening to music Drawing teacher	
	3	7. Playing ground	1 2, 3 4 5 6	Singing 'Slide' Drilling on the skill of using play equipment and playing Playing the instruments in rhythm concert Playing on a balance beam Drawing play ground	

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Sample semester plan (cont'd)

(The first semester)

Months	Week Order	Topics	Class Period	Activities	Reference
May	4	8. Invention game	1 2 3 4 5	Playing with colors Making sounds of various things and imitating the rhythm Stamping on a clay board Moving in various features Making things using natural and waste things	

7) Samples of Instruction development

Singing 'School' (The first class period)

(Text, pages 2, 3)

• Instructional Objectives

- 1) Sing the thematic song with words and number names by ear.
- 2) Song tapping in four-quarter measure.

Equipment

Teacher : Organ, Picture note
Pupil : Percussion instrument (1)

• Instructional Development

Content and activities	Notes
<ul style="list-style-type: none"> • Talking about the school <ul style="list-style-type: none"> • Who welcomes us when we come to school ? • What facilities are in the school and how they are used ? • What activities do we participate in ? • Listening to the thematic song • Being acquainted with the thematic song <ul style="list-style-type: none"> • Talking about the words and the meaning 	<ul style="list-style-type: none"> • The purpose of teaching the picture note is to lead pupils to take interest in the pitch of the sound • To further the affection for school of pupils and love for the country <ul style="list-style-type: none"> • Tambourine playing method  (Strumming on skin)  (side striking)  (tremolo) • Place left forefinger inside and grip the side with a thumb as high as the chest

Content and activities	Notes
<ul style="list-style-type: none"> • Singing, tapping in time <ul style="list-style-type: none"> • Singing with number names, seeing the picture note • Singing with words and number names in forms of question-and-answer <ul style="list-style-type: none"> - sol sol la la sol mi, Let's hurry together - Number names - - Words - (Teacher) (Pupils) • Giving a motion to a song <ul style="list-style-type: none"> • Giving a prompt motion keeping in time and rhythm • Selecting and trying an interesting motion together • Singing, tapping in basic quadruple measure <ul style="list-style-type: none"> • Singing, clapping • Singing, keeping time with percussion instruments 	<ul style="list-style-type: none"> • When striking sides, strike sides with first on the front part of left thumb gripping the instrument. • As the characteristics of a tambourine lies in ringing the sounds of drum and resonant metal at the same time, therefore when, holding it, incline it.

Reference

- Children of Saemaeul (New Village) -

A beu ji ga da ka no eun sae ma eul gil lo
Oo ri deul eun sae ma eul eui chak ham eu rin i

Oo ri deul eun jeul geub ge chak gyo kam ni da.
Seo ro do wa yeol sim hi kong bu ham ni da.

1. Along the road, at New Village, our fathers have cleaned, we walk to school merrily.
2. We are good children living at New Village, we are studing diligently helping each other.

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Drawing what pupils want to express (The fourth class period)

(Text page 5)

• Instructional Objectives

- 1) Draw what pupils want to express with pastel merrily in large size
- 2) Feel the joy of school life through participating in drawing in pairs or in groups

• Instructional Development

Equipment

Teacher	: Materials for stories
Pupil	: a stick, sanitary chopsticks, a pot, nails, pastels, etc.

Content and Activities	Notes
<ul style="list-style-type: none">• Singing 'School' and 'Taegeuk Flag'<ul style="list-style-type: none">• Singing with motions• Singing, and marching• Talking about experiences of drawing<ul style="list-style-type: none">• With what and on what did they draw ?• What is the largest drawing paper in the world ?<ul style="list-style-type: none">- The sky, where God draws -• What is the large drawing paper available ?<ul style="list-style-type: none">- The school ground -• What is needed for drawing ?<ul style="list-style-type: none">- Drawing paper and crayonpastel, etc.• Determining what pupils want to draw<ul style="list-style-type: none">• Events that occur at the school or on the play ground• One of the things pupils have seen at the school, home, town or on the road• Drawing what pupils want to draw<ul style="list-style-type: none">• Drawing on the board• Drawing on drawing paper, newspaper or practicing paper, clearly and in large size	<ul style="list-style-type: none">• Initiate what pupils want to draw• Enhancing the desire for expression enough to have confidence in pupils' own expression• Lead pupils to look for themes around their lives• Find out interesting and characteristic points from the completed works and praise them.

Selected exemplar materials

Content and Activities	Notes
<ul style="list-style-type: none">• Talking about the completed work• Observing them• Explaining the meaning of the picture drawn by pupils individually or in groups• Talking about whose picture is interesting• Finding out the most favorable point	

Reference



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Pleasant School Dance (The fifth class period)

(Text pages, 2, 3, 6, 7)

• Instructional Objectives

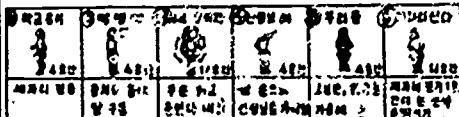
- 1) Represent rhythmical sense caught from a song in bodily motion
- 2) Express one's own thought clearly in front of other friends
- 3) Keep/make good relationship with other members in the class

Equipment

Teacher : an organ, disc, a record player, a whistle

• Instructional Development

Content and activities	Notes
<ul style="list-style-type: none">• Lining up, singing 'school' and 'Taegeuk Flag'<ul style="list-style-type: none">• Forming in line, walking on the same place• Drilling on posture 'attention' and 'parade rest'• Gathering, changing directions<ul style="list-style-type: none">• Finding one's own new place after changing directions• Talking proudly of the school<ul style="list-style-type: none">• Talking about the things related to the school which deserve praise• Singing the school song<ul style="list-style-type: none">• solo by a pupil who knows it -• Dancing the School Bell'	<ul style="list-style-type: none">• Acquire the technique of gathering and lining up.• Lead to participate with pleasure



Number/words measure motion

(1) School bell rings	4	Walking at the same place
(2) Ding, ding ding	4	Imitation of ringing bell; stamping

Content and Activities	Notes
<p>Number/words measure motion</p> <p>(3) Let's gather 16 Holding up and dropping arms</p> <p>(4) Teacher is 4 Pointing to teacher</p> <p>(5) for us 4 Touching chest with right and left hands</p> <p>(6) waiting 16 Walking at the same place, clapping per each measure</p> <ul style="list-style-type: none"> • Dancing to 'Teageuk Flag' <ul style="list-style-type: none"> • After expressing motions freely select good one's to choreograph a dance • Play 'Head, shoulder, Knee, Foot'  <p>Head shoulder knee foot Head shoulder knee foot</p>  <p>Head shoulder knee foot Head shoulder knee ear nose ear</p> <ul style="list-style-type: none"> • Formation : Single-hearted circle or free formation • Familiarizing, first of all, with the thematic song • Pointing to the part of one's body according to the words of the song • Sing and move slowly at the beginning, then perform them correctly as familiarity enhances • Making motions, watching the demonstration and suit 	

Training educational personnel for integrated curriculum

Instructional Module

1. Utilization of local resources, low-cost instructional materials and community participation
2. How to question: development of questioning skills
3. Concepts, principles and rationale of the integrated curriculum and the integrated approach

Country: Republic of Korea

Subject/Topic: Utilization of local resources, low-cost instructional materials and community participation

Course: Training for elementary school teachers

Introduction

Some important competencies needed by the teachers in implementing integrated curriculum are the skills in the use of local resources and low-cost instructional materials and the ability to enlist and ensure community participation. It is desirable that national training courses for teachers include a programme for improving the said competencies.

Target learner

The present module is developed specifically for the organizers of the national training courses for elementary school teachers who are engaged in the implementation of integrated primary education curriculum.

Objectives

This module would enable the organizers:

- a) to develop the competencies needed in implementing the curriculum;
- b) to develop an understanding of the meaning of local resources and low-cost instructional materials;
- c) to realize the importance of low-cost instruction;
- d) to be able to develop training courses for teachers;
- e) to realize the importance of community participation in curriculum implementation; and
- f) to develop competencies to motivate community people to participate in the implementation process.

Activity

Read the following information and answer the questions that follow.

1. Competencies needed in implementing integrated curriculum

A curriculum cannot be materialized until it is put into practice. At this stage processes of learning are involved which require certain kinds of competencies and attitudes on the part of the teacher:

- a) in translating the curriculum into an instructional plan;
- b) in selecting, developing and using instructional materials, including local and low-cost materials;
- c) in organizing learning experiences to meet stated objectives and the individual needs of the student;
- d) in using educational technology in instruction;
- e) in motivating student learning attitudes;
- f) in evaluation of learning outcomes;
- g) in mobilizing local resources for teaching learning; and
- h) in promoting school and community co-operation for effective teaching/learning activities.

These competencies are developed through proper training and practices. It is imperative that training courses are organized to provide opportunities for teachers to improve their competencies.

2. Utilization of local community resources and low-cost instructional materials.

Instructional materials and resources are needed for effective instruction. For an integrated curriculum, due to its nature, the use of instructional materials and resources is even more important. Local resources include both human and material. Human resources may be used as resource persons to provide extended knowledge on particular subjects to be learned by the students. They may also be used to demonstrate and teach practical skills specified in the curriculum. In addition they may assist the teacher in organizing and conducting learning activities.

Material resources are many, ranging from natural resources like minerals, plants animals, to man-made like the health centre, post office, police station, library and museum. The teacher should be helped to locate the resources and to know how the resources can be used for instructional purposes.

The effective utilization of both types of resource requires close co-operation between the school and the community. The agencies which serve the local community like the post office, hospital, police station and library may be requested to provide facilities to the teachers in organizing units of study. Such agencies may also provide on-the-spot information to satisfy the children's curiosity about their functions. Teachers should also be enabled to realize the importance of the natural environment as a source.

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Complementary with local community resources is the use of local low-cost instructional materials. The concept behind this practice is the attempt to seek innovations in order to provide educational opportunities meaningful to the learners by the use of appropriate educational materials. The appropriateness of the materials in the context of countries with limited financial resources is considered to be dependent upon the ability to design and develop the materials from low-cost indigenous sources. In other words the materials will be characterized as low-cost educational materials because (a) the raw materials for developing them are easily available in the local environment, from natural sources, industrial and domestic wastes or discarded materials; (b) they can be developed by the teachers and students with simple tools and put into use without incurring much cost; and (c) the production of the materials is simple, inexpensive and not time consuming.

Several methods of training may be adopted to enhance the skills of teachers and other concerned personnel. These can be in the form of special training courses, workshops or in-service short course. The content of the training courses usually organized in most countries could be categorized as follows:

- a) Need for low-cost educational materials;
- b) Current practices in the use of low-cost materials;
- c) Basic tools for designing and developing aids and indigenous raw materials for preparing the aids;
- d) Guidelines for developing, using and evaluating the low-cost materials; and
- e) Actual development of prototypes.

3. Community participation in curriculum implementation

The success of implementing integrated curriculum depends to a great extent on the cooperation and participation of the community. This is to ensure the identification of suitable activities and learning situations related to the child's environment and also to ensure full realization of the cognitive and affective objectives of the integrated programme. Making education relevant to community needs will always require the involvement of the community. Local skilled persons and other community members may render help in a variety of ways to ensure the effective implementation of the curriculum.

In order to ensure broad-based participation of the community, it is imperative that the people who can assist in the implementation process need to be carefully identified and fully utilized in school programmes. These include local craftsmen, artisans and technicians. Provision can be made in the agro-technical subjects for mobilizing local human resources and utilizing their services to support the teachers. The participation and involvement of community people can best be ensured by letting them know that their needs and problems are being taken

into consideration and that it is they or their children who will directly benefit from this undertaking. Active participation is possible when the people realize that their experiences, skills, and wisdom are taken seriously by the school.

Under the integrated curriculum, students will spend more time out of the classroom. They will be more involved in community development work. Such participation of the students is one of the ways to motivate participation and support of the community.

Broad-based participation of the community also requires co-ordinating efforts on the part of the school in bringing all available agencies together to support school programmes according to their specialists.

Suggested reading

1. APEID High-level Personnel Exchange Workshop on Curriculum Development, Nepal, 2-12 October 1977. *Education policy, curriculum development and implementation: report*. Bangkok, 1978. 27, xii p
2. (APEID) Symposium of Experiences from the Asian Region (on) Implementing Curriculum Change, (report of the symposium) Bangkok, Unesco 1977. 62 p.
3. APEID Sub-regional Workshop on Educational Technology, Dacca, 27 October-8 November 1980. *Low-cost educational materials, report*. Bangkok, Unesco, 1981. 177 p.
4. Obaid Ullah, A.K.M., comp *Low-cost educational materials: a synthesis study*. Bangkok, Unesco, 1982. 39 p.
5. (APEID) Workshop for Development of Modules for Core Curriculum of Teacher Education. Bangkok, 6-21 December 1977. *Development instructional modules for teacher education: selection exemplar modules*. Bangkok, Unesco, 1978. 272 p.

Formative evaluation

The following questions were prepared to check your progress:

1. What are the important competencies needed for teachers in implementing integrated curriculum ? Explain the details of each competency.
2. What constitutes the local community resources ? Explain the benefits of using locally available resources in rural schools.
3. What are the characteristics of low-cost educational materials ? Describe a training course for teachers on low-cost educational materials.
4. Explain how you would motivate community people to participate in the school programme.
5. Draw an instructional plan based on local environment which you would like your teachers to use.

Training educational personnel for integrated curriculum

Country: Nepal

Subject/Topic: How to ask questions: Development of questioning skills in teaching

Course: Environmental studies

Reported by: B.N. Aryal

Introduction

The question and answer method is an effective method of teaching but will be even more effective when it is applied properly. Since it is a highly talented skill, teachers should be very particular about how they frame their questions. The following guide will help teachers improve their techniques:

Kind of questions

The kinds of questions generally used by the teachers are:

- i) Knowledge questions; and
- ii) Action questions

Knowledge questions, which may also be short-answer questions, do not seek detailed information about the subject concerned. For example:

Whose book is this ?

Who brought this umbrella ?

What did the boy do ?

Where are such things sold ?

Recall or memory type questions such as these are generally utilized for obtaining specific information which the children have already acquired. The answer to those questions can usually only be right or wrong.

Action questions are divided into two categories:

- i) Simple observation questions; and
- ii) Project work questions

There are a lot of things around us in our environment which can be used in teaching/learning activities. Teachers' and students' involvement in observation of the surrounding may be based on questions:

What do you see in the pond ?

How is the sky today ?

What is the colour of this flower ?

The children not only observe things around them but they also want to touch, smell, feel and play with these. They enjoy collecting materials such as stones, soil, leaves, sticks, bricks, slates and flowers. They also like to classify, measure, weigh, cut, break and draw them. They also like to describe, compare and relate their experiences.

Objectives

After use of this module the trainees will be able to:

- i) develop the skills and attitudes necessary for using the local environment in teaching/learning;
- ii) develop the skills needed to collect materials from the surroundings, observe and classify them;
- iii) develop skills asking questions;
- iv) guide children in project work related to curriculum materials;
- v) guide children in learning by doing;
- vi) guide children in broadening their horizon of thinking; and
- vii) develop the interest and creativity of children by making teaching-learning more meaningful.

Activities

As an example, the teacher may take some students to visit a brick kiln. After the students have had time to carefully observe and handle some bricks, questions such as the following may be asked:

- a) Describe the different kind of colours you see in the bricks,
- b) Is the brick soft or hard?
- c) What is the easiest way of breaking the bricks into pieces ?
- d) How much do you think the brick weighs? (or How heavy do you think the brick is ?)
- e) After collecting some more pieces of bricks and stones, can you classify them in terms of weight, shape, size and colour ?
- f) Can you note down the comparative differences between the bricks and stones ?
- g) After observing the walls, can you describe the use of bricks, etc. ?

The above questions may help promote active learning of children.

Implication for teachers

This technique works successfully in various project activities. One cannot introduce this pattern effectively by just talking about it in the classroom. The teacher should initiate, motivate and facilitate the children in their learning activities. She has to help the children to:

- collect the materials
- make a list of questions
- classify the questions
- divide the children into small groups
- assign each group one or more projects
- work with each group

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- keep records and make notes
- synthesize the overall project activities
- assess the outcomes of the activities

Country: Republic of Korea

Subject/Topic: Concept, principles and rationale of the integrated curriculum and the integrated approach

Course: Training for curriculum implementors

Reported by: Dr. Byong - Sun Kwak

Introduction

Many countries in Asia are very much concerned about making the curriculum relevant to the needs of the children and the community. Alternative curriculum structures have been tried and tested, among them is the integrated curriculum. It is evident that all countries, with the exception of one or two, are currently using integrated curriculum in the primary schools of their countries in one form or the other. Since the integrated curriculum has been introduced in countries participating in the last innovative project only recently, the majority of teachers, supervisors administrators and those who are involved in the implementation of the curriculum are still not clear about this new type of curriculum. This makes it difficult for them to play a proper role in implementing the curriculum.

Objectives

This module is designed to help curriculum implementors understand the theoretical as well as the practical aspects of the integrated curriculum. Specifically it is expected that this module will enable the learners to:

- 1) have a clear understanding on the concepts, principles and rationale of the integrated curriculum;
- 2) differentiate between the integrated curriculum and other types of curriculum;
- 3) apply an integrated approach in organizing teaching/learning activities;
- 4) understand their roles in implementing an integrated curriculum; and
- 5) develop integrated curriculum plans.

Instructions to trainers

- 1) Before you proceed with this module give the pre-test Part I to the learners. If the test indicates that the learners have adequate knowledge about in-

tegrated curriculum you may skip the exercise relating to the first and second objectives of this module. Otherwise you should make the learners read the following reports:

- a) APEID Planning Meeting. Seoul. 3-8 November 1980. *Integrating subject areas in primary education curriculum: general guidelines and country plans of a joint innovative project*. Bangkok. Unesco. 1981. 60 p.
- b) APEID Finalization Meeting on Integrating Subject Areas in Primary Education Curriculum. Bangkok. 8-15 December 1981. *Proceedings and recommendations*. Bangkok. Unesco. 1982. 49 p.

2) The above materials enable the learners to learn about the concept of integrated curriculum by themselves. They may compare the ideas which are expounded in the two reports and take note on how the concept has been modified.

3) Give the post-test of the questions to ensure that they have really mastered the subject.

4) After the learners have accomplished the first and second objectives of the module, ask them to read the following:

- a) APEID Finalization Meeting on Integrating Subject Areas in Primary Education Curriculum. Bangkok. 9-15 December 1981. *Proceedings and recommendations*. Bangkok. Unesco. 1982. 49 p.

5) After they have gone through the activity in item 4), give Part II of the test, which is the evaluation of learning outcomes.

Pre-test/post-test

Part I

1. Give reasons under psychological and pedagogical principles to show the necessity for integrated curriculum at the primary level.
2. Explain how curriculum integration helps minimize certain administrative problems.
3. What are the different aspects of curriculum integration? Explain how these aspects facilitate the development of a relevant and flexible integrated curriculum based on the needs and interests and environment of the children.
4. Among the three forms of curriculum integration, namely, integration by broad fields of subject area; integration by themes and projects; and integration by emerging interests and concerns of children, state the strengths and weaknesses of each form. Indicate which form of integrated curriculum you will select for the schools and why.

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Part II

1. What are the major activities involved in the design of learning experiences ?
2. What criteria should be adopted in designing learning experiences ?
3. What are the criteria for the selection of instructional strategies ?
4. What should be the roles of the following persons in implementing the integrated curriculum : (1) teacher; (2) principal; (3) supervisor; (4) administrater; and (5) parents ?
5. Draw framework of an integrated curriculum plan for grade I.

Teacher Leaflets

- 1 Improving pupil Enrolment
2. Encouraging Community Participation in your school
3. Preparing an Individual Lesson
4. Identifying and Helping Physically Handicapped Students

Country: Bangladesh

Subject/Topic: Improving pupil enrolment

Course: School management: Guide to teachers

Reported by: Dr. A.K.M. Obaidullah

Introduction

Improving pupil enrolment - an important step towards attaining universalization of primary education. Teachers have a vital role to play towards better management of schools by motivating the children and their parents. This is an exemplary teachers' leaflet assisting the teachers identify and seek answers to many problems encountered in respect of pupil enrolment.

The leaflet may be introduced to the teacher by the supervisor as he visits schools on a regular schedule. The teachers are required to do the exercise contained in the leaflet giving their views and comments.

Improving Pupil Enrolment

Let us read a story

One day, Mr. Abdur Karim, the Headmaster of Manipur Primary School on his way to school, met Rahim, a student of grade II

He asked him, "What are you doing ? You should be in school now."

In reply the boy said, "Sir, my father is a farmer and he is sowing the field alone. I must help him, otherwise we will be in hunger."

Next Mr. Karim met Sarker, father of a grade V ex-student and asked, "How is your fine son ? Why did you not send him to school ?"

"Yes, he is fine, he is really doing good work in my shop without idling in the school. It would not have been so, if I had sent him to

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school. I am also not going to sent my other children to your school." The Headmaster walked away sadly.

Next he met Ayesha, sister of a grade III boy.

He asked, "Little girl, why don't you come to school with your brother?"

"Sir my brother is wasting his time in school, he is still unable to read and write, but see, I am looking after my baby brother and learning how to help my mother and look after the house," she replied.

On his way he met Ganesh fishing, "Aren't you coming to school ?" he asked.

"Sir, school is boring for me, because I fear your big stick and I think I will fail the test, so I ran away from school. Look at the big fish I caught, how pleased my mother will be."

The Headmaster was highly impressed by the boy's expression. He wished that he could also stay by the side of the river in the fresh air instead of confining himself within the four walls of the classroom.

Reasons why children do not go to school : A practical exercise

In the story the children did not go to school for many reasons. What were these reasons ? Complete the following statements:

1. Rahim was unable to attend school because.....
2. Sarker will not send his other children to school because
3. Ayesha thought it was not important for her to go to school because.....
4. Ganesh was not willing to go to school because.....
5. Karim, the headteacher, did not want to go to school because.....

Group discussion

- a) From your own experience tell the group about two children you know who do not enrol in school or who drop out. Why are they not in school ?
- b) Make a list of all the reasons why you think children in your village do not enrol in school or drop out.
- c) Compare the reasons why children in your village do not go to school and the reasons given in the story. Are they the same or different ?

Continue reading the story

At school the headteacher went to each class. Sixty students were registered on grade I but only 38 were present. Twelve students were registered in grade V but only six were present. He called a special meeting of the teachers.

"Today," he said, "We must decide what actions we can take to enrol more children in school. Also," he said, "we must decide now how best we can check drop-outs."

Simulation Exercise

- Imagine you are teachers at the meeting in Manipur School.
- Choose one of you to act as:
 - - the headteacher, Mr. Karim (Chairman)
 - - the grade I teacher, Miss Shamima Begum
 - - the grade IV-V teacher, Mr. Hafiz Sheikh (Secretary)
- Discuss among yourselves what can be done by the teachers to improve enrolment and prevent drop-outs.
- Make a list of all the decisions taken

Example

Decision	Action to be taken	By whom	Date
Gain co-operation of parents	Visit 6 households to discuss enrolment	All teachers	October
1.			
2.			
3.			
4.			
5.			
6.			

Training educational personnel for integrated curriculum

Country: Bangladesh

Subject/Topic: Encouraging community participation in your school

Stet/Course: School and the Community: Guide to Teachers

Reported by: Dr. A. K. M. Obaid Ullah

Introduction

This leaflet is intended to help teachers better understand the relationship of the school with the local community and motivate the parents to send their children to school and also to encourage their participation in matters relating to the welfare of the school. Stress has been given more to the teachers' role in the community with a view to obtaining support of the community for better management of schools. Exercises are also given in the leaflet, to stimulate teachers' wisdom.

Encouraging Community Participation in Your School

Here are some of the people who live or work near your school.

Some of them are rich and some are poor, some are educated and some are illiterate.

But all of them are members of the community.

List any other types of community members who live near your school.

Example craftsman

1. 2. 3.
4. 5. 6.
7. 8. 9.

Village Headman	
Farmer	
Family planning officer	

The school community is all the people who live and work near your school

Community participation means that all the people take an interest in and are involved in the development of school.

Practical exercise

Below are some reasons why the community should participate in the life of the school.

- to motivate their children to attend
- to become literate
- to understand the homework
- to help maintain the building
- to motivate the teachers

Selected exemplar materials

Write down any other reasons you may think of
.....
.....

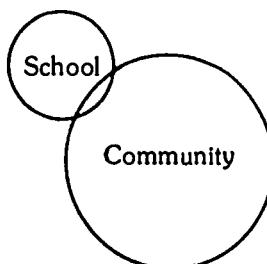
Definition: Community participation means school/community co-operation.

Think about your own school

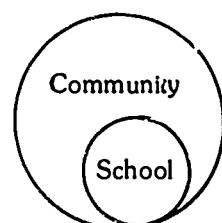
Which diagram best
represents
community
links with
your school ?



School apart from community



Some cooperation



School is integral part
of community

In order to create interest and involve the community in the school affairs the teachers themselves must be interested to take part in the developmental activities of the community:

Teacher participation in the community

How often do you: (Tick one answer)

	Often	Sometimes	Hardly ever
1. Go to visit parents to discuss their children's education ?
2. Take the students to local places of interest ?
3. Invite local people to visit the school ?

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4. Participate in local societies, clubs, cultural events etc.?
5. Stay in the village when on leave ?
6. Do social work in the village ?
(if you answered 'often' to all 6 questions, you are a community-oriented teacher)

How can the teachers create a community school?

Here are some ways in which teachers can create a community school:

- invite local persons with knowledge and skills to talk to the students
- invite the managing committee to meet frequently (do you know who the members are?)
- have a school 'Open Day' and invite the community to come
- ask interested community members into school to hear the children read
- ask some mothers to bring the small children to school on a rotation basis.
- have a Sports Day and invite out-of-school children to take part
- ask a local patron to give a prize to the children for the best-kept classroom.
- call a meeting of parents and explain to them how to help with homework
- observe parents day and invite the local parents
- observe the school anniversary day and invite the community people.
- ask community members to contribute their ideas on how to improve the school environment (building, furniture, teaching materials etc.)
- exhibit children's arts and drawings and invite the parents and community leaders to see it.

List any other ideas you can think of

.....
.....

Follow-up activity

- Have a meeting of the teachers in your school and draw up a plan of action for one month to create maximum participation in your school
- Discuss your ideas with your ATEO on his next visit to your school.

Country: Bangladesh

Subject/Topics: Preparing an individual lesson

Course: Classroom instruction: Guide to teachers

Reported by: Dr. A.K.M. Obaid Ullah

Introduction

This serves as a guide to teachers in preparing daily lessons. First, it requires the teacher to take some time, prior to such preparation, to make queries like: Who is to be taught ? What is to be taught ? How is it to be taught ? The next steps are to go through the syllabus, prepare a scheme of work with a series of lessons, develop lesson plans and make provision for student learning.

Suitable exercises are given in the leaflet to promote a better understanding of the steps in a lesson and to encourage their effective development

<i>Environmental Studies (Social) Class II</i>			
Syllabus	Scheme of Work	Series of Lessons Content	Method
Family environment	<ul style="list-style-type: none">i) Location of own house & addressii) Profession of parents & other family members	<ul style="list-style-type: none">Travel in imagination round villageDescription	<ul style="list-style-type: none">Teacher builds up village map on blackboardStudents show how to get to their house on the mapStudents tell class about their familiesTeacher builds up list of professions on blackboard

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Preparing an Individual Lesson

At the beginning of a lesson which teacher would you prefer to be?

LIKE THIS ONE ?

Picture of
disorganized
& fearful
teacher in
class

OR LIKE
THIS ONE ?

Picture of
well-organized
and confident
teacher in
class

Preparation of a lesson is easy if you spend five minutes beforehand for each of these questions:

Who is to be taught ?	Students' home environment! health & nutrition students' ages, level of ability, previous knowledge
What is to be taught ?	What topic, theme or subject matter ? What knowledge or skills should the students acquire ? What does the textbook & Teachers Guide say about it ?
How is it to be taught ?	How to introduce the topic ? How to explain the lesson ? What are the students to do ? What materials are to be used (textbook, pencils etc ? How to consolidate the students' learning ? How to obtain feedback from the students ?

EXERCISE Take the topic "My family" for Class II in your school. Prepare a single lesson by writing down answers to the three questions
Who is to be taught? What is to be taught? and
How is it to be taught?

Teacher Leaflet No. 3

What Can I Do? How Can I Do It?

Preparing lessons



Question 1

What are the official subjects of the primary school curriculum?

1. 2. 3. 4.
5. 6. 7. 8. 9.

Definition

A *Syllabus* is a curriculum subject with topics and sub-topics

Question 2

Why should a teacher know the topics for classes higher and lower than the one he teaches? Tick the correct answers

i) so that he can take the class of an absent teacher	ii) so that he can become an all-grade teacher
iii) so that he can have an overall knowledge of the subject	iv) so that he can adapt his teaching to what students have been taught and will be taught

Definition

A *Scheme of work* is the re-arrangement of the topics and sub-topics of the subjects so that they can be taught in a suitable order for the students to understand. A Scheme of work should take into account

i) timetable allocation for the subject	ii) student's ability
iii) students' previous experience	iv) text-book and Teacher's Guide

Question 3

Who should devise the schemes of work for each subject ?

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Definition

A Series of lessons is the teacher's plan for teaching a particular topic, theme or concept over two, three, four or even more lessons.

Question 4

Why is it useful to plan a series of lessons as well as a single one ?

.....

Answers

Qu. 1 Subjects of the primary school curriculum are: Bengali, mathematics, English, environmental studies (social), environmental studies (science), physical education, art & craft, music, religion.

Qu. 2 All the answers are partially correct but iii) and iv) are more correct.

Qu. 3 Ideally each teacher should prepare his own scheme of work for the term or year. But the comprehensive scheme for all classes and subjects should be a team effort of all the teachers in the school.

Qu. 4 A series of lessons allows the teacher to be flexible and go faster or slower according to student needs. It allows the teacher to plan a variety of teaching methods - e.g. reading, writing, practical activities.

Country: Bangladesh

Subject/Topic: Identifying and helping physically handicapped students

Course: Class Management: (Guide to teachers)

Typed of material: Exemplar teachers' leaflet

Reported by: Dr. A.K.M. Obaidullah

Introduction

This leaflet is to help the teacher to identify physically handicapped children (vision, hearing, speech, movement) and understand their problems. It will also help the teacher to give them proper guidance and individual assistance, so that they may do better work in schools and outside.

Teacher Leaflet No. 41

Identifying and Helping Physically Handicapped Students

To think about: Can you see the words in this leaflet ?

Could you hear a friend reading it to you aloud ?

Can you pronounce all the words ?

Can you fold it neatly in half?

Some people cannot do these things which most of us take for granted

Objectives

This leaflet will help you to:

- recognize certain physical handicaps.
- identify children who have these handicaps.
- provide some help to those children so that they may do better in their school work.

To discuss

Some children cannot see, some cannot hear, some cannot speak and some cannot move.

Do you know any such children?

What are the names of these handicaps?

Other children can only partially see, hear, speak or move.

Sometimes unless you look carefully, you may not notice these children.

Do you know any such children?

What problems do they have in school?

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Definitions

The following are approximate functional definitions for normal vision, hearing, speech and movement for children of primary school age. Please remember that the term normal implies a wide range of ability-the definitions given below are for convenience only:

Vision:

without spectacles can identify and describe a person at a distance of 20 feet and read ordinary print at a distance of 12 inches.

Hearing:

in a quiet place, can hear a watch ticking at a distance of not less than 30 cm from either ear.

Speech:

able to pronounce clearly most of the common sounds of the mother tongue.

Movement:

able to open and close a matchbox, hold a pencil, throw a ball, run, jump and hop on either foot.

Group Activity

Screening tests: Test few students on an individual basis in a private place. Explain to each child what he is doing and why. Do not frighten or alarm the children. Results of the screening should only be discussed with your fellow teachers or the child's parents or guardian.

Vision:

Ask the child to hold an unfamiliar book and read an easy passage (or describe pictures if he is unable to read).

Take note of each child who moves the book very close or very far away or who squints or turns his or her head to see.

Hearing:

Ask the child to listen carefully as you slowly bring a wrist watch from arm's distance to within a few centimetres of each of the child's ears in turn. Ask the child to tell you when he first hears the ticking. Repeat to verify and note results for each child.

Speech:

Hold a conversation with the child to elicit responses which contain most of the common sounds of the spoken language. Note each child's mispronunciations or inabilities to pronounce sound.

Movement:

Ask each child to open and close a matchbox, hold and use a pencil, throw a ball, run and jump and hop on each foot. Note any problems with various movements.

Individual follow-up

- Screen all the children of your class (es) for handicaps and make notes on each. For speech and movement handicaps note whether or not any deformity exists. Give precise descriptions of each child's handicaps if any and review your screening notes with the other teachers
- Take these immediate interim measures to help:

Vision:

request parents or guardians to provide necessary spectacles (In the meantime ensure that each child has assistance in reading from the blackboard or text book).

Hearing:

move the hearing handicapped children closer to your teaching position. Check periodically to be sure each one can hear.

Speech:

unless deformity exists give private coaching in pronouncing difficult sounds. Be very patient and very gentle. Do not force child to practice speech in front of other children.

Movement:

provide games and other physical activities in which the handicapped child can participate successfully.

Teachers Guide

1. Food
2. Good manners, health and safety habit
3. Life of plants and animals

Country: India

Subject/Topic: Food

Course: Environment studies I - II

Reported by: Mr. S. H. Khan

Introduction

'Food' is an illustrative topic in the teachers' guide of environmental studies I

II. The topic suggests the methodology to be followed by teachers during their teaching programme. It indicates the learning outcomes and also includes illustrative questions for evaluation. The methodology and evaluation questions are suggestive. The teacher may take guidance from these but he will have to evolve his own methods according to environment other requirements

Food			
Learning Experience	Time	Learning Outcome	Materials required
1	2	3	4
1. The teacher will ask the children about the type of food they eat. He will list the common food items on the blackboard such as rice, dal, chapati, vegetables, eggs, fruit, milk, butter/ghee and curd, with the help of the children. The teacher will stimulate the children to think and talk about why they need food. (Fig. I)	90 minutes	1.1. The child knows about the variety in our food. 1.2. The child understands why he should eat food. 1.3. The child pronounces the food names correctly	1. Chart showing the food articles.
2. The teacher will guide a discussion on how food is prepared, e.g. (a) Fruits and Salads are eaten without cooking. (b) Rice, vegetables, eggs, milk are taken after boiling.		2.1. The child knows that some items of food are taken without cooking 2.2. The child knows the significance of food preparation such as cooking, boiling, frying, etc.	

3. The teacher will guide a discussion on how cooked food can be kept for some time, e.g., it is kept covered in clean utensils in dry and cool places.
4. The teacher will discuss the storage of various food items;
 - (a) Non-perishable
 - (b) Perishable.

The children may name the items and draw sketches of the items which are used for storing grain e.g. bags, pots, cans and bottles.
5. The children, through the help of parents or elders, may collect samples of enemies of our food such as house-flies, ants, cockroaches, rats and moulds.
6. The children are asked to name the food of pets and domestic animals. The teacher should make a list of pet animals and get the information about their food habits from the pupils. Similar procedure can be adopted in the case of domestic animals. Further, the teacher can arrange visits to their dwelling-places preferably at the time when food is served to them and ask the children to note their habits of taking food.

Evaluation

1. Why do you eat ?
2. What are the various types of food ?
3. How are the food items stored ?
4. What are the common enemies of our food ?

- 3.1 The child knows the significance of proper storage of cooked food.
- 3.2 The child knows that if the food is not stored properly it gets spoiled.
- 4.1 The child understands the need for storage and the different ways of storing.
- 4.2 The child differentiates between perishable and non-perishable items.
- 5.1 The child can name common enemies of our food and is able to identify them and relate them to the damage caused by each.
- 6.1 The child knows that the food habits of animals differ from ours and also knows about the points of similarity.

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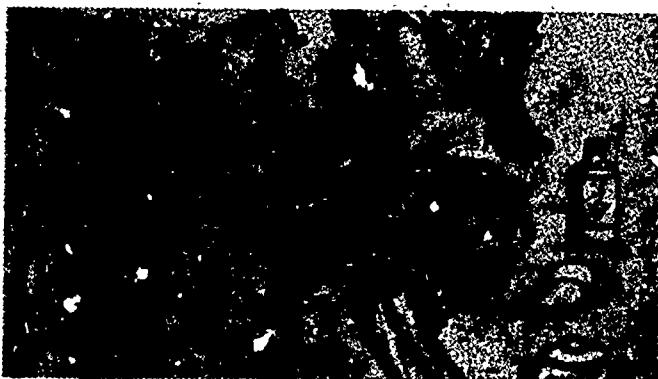


Fig. 1 Children may observe various food items at home or in the markets. Drawings, such as those in the photograph, may help the record their observations accurately.



Fig. 2 Teachers may use such charts as well for evaluation of child's knowledge as for instruction about balanced diet.

Country: India

Subject/Topic: Good manner, health and safety habits

Course: Environmental studies I - II

Reported by: Mr. S. H. Khan

Introduction

Good manners, health and safety habits is a sub-topic of the teachers guide of environmental studies I - II. This is an exemplary topic. This topic is not to be read in the class. This only suggests the methodology to be followed for the execution of the course. The suggested learning experiences may be modified to suit the class and the teacher. The topic is presented with the objective of helping the teacher in his own micro-level curriculum-planning which cannot possibly be centrally dictated in the case of environmental studies.



Fig. 1 Taking a mid-day school meal in disciplined way is an aspect of good habits.

Good Manners, Health and Safety Habits

Grade II

Materials

Learning Experiences 1	Time 2	Learning Outcome 3	Materials Required 4
1. The teacher gets the children to recite some songs about the school.	1 hour	1.1. The child develops a sense of belongingness to the school. 2.1. The child understands the importance of being punctual.	Chart showing different activities organised in school
2. The children observe pictures and have discussion on punctuality. Charts may be displayed showing different activities organized in the school.		2.2. The child develops an understanding of the school and its working and takes it as his second home.	

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Learning Experiences 1	Time 2	Learning Outcome 3	Materials Required
3. During the assembly prayer, Out-of-class while returning from games or drinking water the children are made to stand and move in a queue. While slates/exercise books are being distributed the children may be asked to wait for their turn.	activity	3.1 The child develops the habit of standing in a line and waiting for his turn.	
4. Picnics may be organized to provide an occasion for sharing things with others.		4.1 The child develops an clean and realises the value of cleanliness.	
5. The children are taken to 30 minutes their school garden where they work together.		5.1. The child develops the habit of working and playing with others.	
6. On a prize-giving day, In-Out-of-class dependence day, Republic day, Gandhi-Jayanti and Bal Divas the children, decorate the classroom and the school compound.	activity	6.1. The child develops the sense of belongingness to the school, the community and the nation.	
7. The teacher highlights the 15 minutes importance of cleanliness of nails, hair, mouth, etc.		7.1. The child develops the habit of keeping his body and clothes clean and realises the value of cleanliness.	
8. The teacher supervises the 15 minutes children washing their hands before and after eating.		8.1. The child develops the habit of washing his hands before and after eating.	
9. The children may be advised not to insert anything into theirs ears or nose and not to use the pin or use match-stick to clean their ears.		9.1 The child develops personal safety habits.	
10. The teacher tells the children that while walking on the road they should keep to the foot and use the foot-paths.	Field trip	10.1 The child knows the rules of the road.	

Learning Experiences 1	Time 2	Learning Outcome 3	Materials Required 4
While crossing the road the children should look to the right and the left.			
11. The teacher may show the traffic signs, and signals, if any, and may explain their meanings to the children. The children may be asked to observe traffic signs and note them in their exercise-book or notebooks.	Field trip	11.1. The child understands the meanings of various traffic signs and road signals.	
12. The teacher may stress to 30 minuntes	12.1	The child develops personal safety habits.	
the children that they should not play with sharp instruments. fire, electric appliances, chemicals or hot water, nor should they throw stones at one another.			
13. The children may be advised not to swim alone in ponds or rivers nor should they run after moving vehicles or turn the road into a playground.		13.1 The child develops personal safety habits.	
14. The children may be advised not to peep into a well, river or pond.		14.1. The child develops personal safety habits.	



Fig. 2 It is a fun to drive a minicar and know the traffic rules through such activities.

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Evaluation

1. At what time do you get up ?
2. At what time do you take your food in the morning ?
3. At what time do you come to your school ?
4. What do you do when the teacher enters the class room ?
5. Narrate a story highlighting the habits of good manners and courteous behaviour.
6. What are the things that you should do to keep yourself fit ?
7. List the things that you should not do.
8. Why do you wash your clothes ?
9. Why do we cover our food ?
10. Why do you walk on the footpath ?
11. Why should you work and play together ?

Note: Learning outcomes related to good manners and safety habits can be achieved through continuous practice adopted in the school. Activities leading to formation of good habits may be included in the regular programme of the school.

Country: India

Subject/Topic: Life of plants and animals

Course: Environmental studies I - II

Reported by: Mr. S. H. Khan

Introduction

'Life of plants and animals' is a sub-topic in the teachers' guide for environmental studies I & II. It is an illustrative topic and indicates learning outcomes and methodology. It also includes some illustrative questions for evaluation of children. The methodology is suggestive. The teacher will have to design his own method depending upon the local environment and requirements of the children.

Learning Experience 1	Time 2	Learning Outcome 3	Material required 4
1. The teacher takes the children to the school garden (or a nearby garden, a vegetable garden, kitchen garden) and asks them to observe the plants and trees and tell their names. He may help them by telling the names of one or two plants himself.	Out-of-class activity for one day	1.1. The child can name the plants and trees in his environment.	1. Chart showing different kinds of plants



Fig. 1 The children can collect pictures of a variety of animals and birds and keep them in their scrap books.

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<p>The teacher should then ask the children to name the different parts of the plants and trees, like stem, leaves, flowers etc. If necessary, he may uproot a small dried plant and show the root to the children.</p>	<p>1.2. The child is able to name the various parts of the plants and trees.</p>
<p>2. The teacher shows them a tomato plant and asks them which part of each plant is eaten.</p>	<p>1.3. The child realises that plants grow not only above the ground, or in water but also under the ground.</p>
<p>3. The teacher should ask the children which parts of the plant other than the fruit are also eaten.</p>	<p>2.1. The child realises that while in the case of tomato the fruit is eaten, in other cases, other parts of the plant are eaten.</p>
	<p>2.2. The child can give some more examples where the underground stem and root are eaten.</p>
<p>4. The teacher should ask the children whether all the trees are of the same height and girth.</p>	<p>2.3. The child can appreciate the diversity in the usage of plants.</p>
	<p>3.1. The child is able to recall that leaves are also eaten both by men and animals.</p>
	<p>3.2. The child knows that some plants are used as medicines, and some as house-building material etc.</p>
	<p>4.1. The child knows about the diversity in the plant life.</p>

Selected exemplar materials

<p>The teacher should also refer to the point that there are some trees which were there even before the children were born and are still present while there are some which have a very short life. This can be done by giving examples of a seasonal crop and of big trees like neem, mango or orange.</p>	<p>4.2. The child realises that some trees have longer life than others.</p> <p>4.3. The child knows about the functions of different parts of the plants.</p> <p>4.4. The child realises the importance of conservation of plant life and the functions of plant parts.</p>
<p>The teacher can also introduce the functions of some parts of the plant, e.g., trees get water through the roots.</p>	
<p>5. The teacher should ask a child to describe his daily routine from the time he gets up. When the child comes to "I take tea/coffee/milk" he should be asked how he gets milk. The teacher should ask the students to name some more animals whose milk we use. They may name buffaloes, goat, yak. The teacher should then ask the children to name some more animals.</p>	<p>1 hour</p> <p>5.1. The child knows about the names of some animals in his locality.</p> <p>5.2. The child realises that some animals are domestic while some are wild.</p> <p>5.3. The child knows the reason for not keeping wild animals in the house.</p> <p>5.4. The child is able to tell the advantages of keeping domestic and pet animals. He is able</p> <p>2. Chart showing different kinds of animals.</p>

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The children may name such animals as the dog, cat, rat, sheep, lion, bear, horse, monkey, donkey etc. The children should be asked to collect the pictures of these animals.

The teacher should ask the children where these animals are found. Then he should ask further questions leading to the fact that some animals like the cat, dog, cow, goat, horse etc.. are domestic or pet animals, whereas the lion, bear, etc., are wild animals and are not kept in the house. They should be asked to give reasons for not keeping wild animals in the house.

The teacher should then ask, "Where do you keep your cow, dog or goat?" The children will give reasons for keeping them in their respective places. There may be a further discussion about their food.

to appreciate the differences amongst different animals.

5.5. The child can identify animals from their pictures.

5.6. The child will realise that the animals also need shelter, food, care and love and that they are useful to us.

Evaluation

1. What is the utility of plants for us ?
2. Name the different parts of plants and trees.
3. Activities:
 - (a) Collect the leaves of different plants and trees and prepare an album.
 - (b) Collect the roots of different plants and prepare an album.
 - (c) Collect different insects in empty injection (vaccine) bottles.
4. Why do you keep domestic animals ?
5. Why do you keep your cow/goats/hens/ducks in closed and covered places ?
6. Identify the animals from the pictures shown.

Instructional Plan

1. Receiving guests
2. Food

Country: Thailand

Subject/Topic: Receiving guests.

Unit: We help our parents

Course: Character development and work-oriented areas of learning experiences

Reported by: Dr. Siriporn Boonyananta

Introduction

This exemplar instructional plan is intended for use as a guide to teachers in experimental classes and may be used for multiple class teaching. The subject areas to be integrated during the course of instruction include : music, arts & crafts, moral education, work-oriented education. The concept which should be developed within the main topic is ; a host must receive his/her guests with good manners; every member of the family must help each other in doing housework so as to gain self-confidence and bring happiness to the entire family.

This instructional plan was tried out in 1982 and is now being finalised in the Curriculum Development Centre, Thailand. The teachers may develop their own teaching plan in the light of the model suggested here.

Receiving guests
(Extracted from Unit 2)

Concept

A host must receive his/her guests with good manners

Objectives

To be able to:

1. show proper manners in receiving guests;
2. receive guests and talk with them politely;
3. serve guests as a good host and without being asked;
4. make decorative objects for a living-room; and
5. act and clap hands along with the song about receiving guests.

Desirable qualities to be emphasized

1. Responsibility
2. Discipline

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Content

1. Manners in receiving guests
 - 1.1 Paying respect
 - 1.2 Greeting
 - 1.3 Conversation
2. Services for guests
 - 2.1 Seating
 - 2.2 Drink and necessary things for visitors

Activities

1. Teacher invites a person (a teacher in school or someone in the community with whom the teacher is acquainted) to be the teacher's guest in the classroom
 - When the guest is talking to the teacher, three grade I students come out and play noisily and annoyingly (as planned ahead by the teacher).
 - Two grade-2 students go to inform the teacher about it while he is talking to the guest (also planned in advance).
2. All the students both grades I and II are grouped together into three groups and work on the assignment given by the teacher (see worksheet at the end of the instructional plan).
3. Each group has to make a summary and report it to the class (at the same time a member of the group is asked to write the summary, as being reported, on the blackboard).
4. Each group has to discuss the same topic, "When a guest comes, what should one as a host, do and should not do ?" In addition the students have to record the discussion on the record form (see p. 86)
5. The teacher copies the record form on the blackboard and asks students to discuss and summarize it. The teacher then puts it on the blackboard (if possible the teacher can copy the summary on a piece of paper and put it on the bulletin board for students to copy later).
6. Teacher assigns students to interview their parents on the following topics and record the answers at home.
 - 6.1 What should you do when a guest comes:
 - when the guest arrives;
 - when the guest is in the house and the parents are not at home;
 - when the guest is in the house and the parents are at home;
 - when the guest says good-bye;
 - when the guest has left the house ?

6.2 What are things that students can do to serve the guest on behalf of their parents?

a. Certain things that students can do by themselves without being asked

1.
2.
3.

b. Things ordered to do by their parents

1.
2.
3.

7. Representatives from grade I and grade II students demonstrate "how to receive guests" in the class.

8. The teacher helps the students summarize the different ways of receiving guests in different houses.

9. The teacher and the students sing the song "Manners for a Host" together and act along the singing. (See words of the song on page 85).

10. Group the students according to their ability and assign each group to use materials available locally to make decorative objects and household items such as flowers, flower-baskets, vases, saucers and letter-keepers.

11. Each group sends a representative to present instruction on how to make the object and explain its usefulness.

12. The students exhibit their work at the place arranged by the teacher.

13. The teacher writes the form for recording receiving guests (see page 80) on the blackboard and asks the students to copy it and give it to their parents for recording and reporting students' receiving guests.

14. The teacher has each group of students perform role-playing on the topic which the teacher has assigned before (see Worksheet 2 at the end of the instructional plan).

15. The teacher helps the students make a summary from the role-playing.

16. The teacher assigns students to practice receiving guests at home (as also suggested in activity 13.) and submit the report to the teacher occasionally. When the teacher has the reports from the students, he/she should correct or make recommendations to the students individually. In addition, the teacher should find an opportunity to discuss it in the classroom.

Teaching materials

1. A record form-for activities 4 and 5

2. A flip-chart for songs-for activity 9

3. Job sheet-for activity 10

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4. Worksheets and necessary objects for receiving visitors
(available in most schools)
 - for activity 2 and 14
5. A record form-for activity 13

Evaluation

1. Check the students' working by observing the following:
 - 1.1 Working habits
 - responsibility
 - tidiness and cleanliness
 - manners in paying respect
 - generosity
 - thrift
 - 1.2 Working ability
 - application of knowledge and skills
 - deftness
 - working system
 - 1.3 Attitudes
 - interest and attention in working
 - participation
2. Check the students' work
 - 2.1 Correctness
 - 2.2 Neatness
3. Evaluate students' knowledge by the following methods:
 - 3.1 Questioning and interviewing
 - 3.2 Testing with test items

Worksheet I

Activity 2

Group 1

Discuss the following topics:

1. Is the grade I and II students' conduct as you have seen appropriate or not ? Why ?
2. How does such conduct affect the students and the teacher and if there are visitors coming to your house, how should you behave towards your guests ?

Group 2

Interview the guest on the following:

1. How do you feel about those students' conduct ?
2. If those students were your own children, what would you suggest they should do when there are guests at their house ?

Group 3

Interview your teacher on the following:

1. How do you feel about the students' conduct ?
2. What do you think the students should do when there are guests at home or at school ?

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Worksheet 2

Activity 14

Every group has to perform a role-playing on "receiving guests" according to the following topics :

1. Greeting and talking with the guests
2. Serving the guests
3. Seeing the guests out.

The students have to arrange the selection of players, the place which is supposed to be the house and the living room, and necessary objects for receiving guests etc.

The groups are assigned the following role-playings:

Group 1. Receiving adult guests

Group 2. Receiving friends

Group 3. Receiving monks

An example of a record form for Activities 4 and 5

Discussion-Record Form

Group Name of the Leader
Group members 1. 2. 3.
4. 5. 6.

What one should do when
there is a visitor What one should not do
when there is a visitor Reasons for what one
should not do

1. Pay respect to the guest and also greet him.	1. Do not make loud noise .	It annoys the guest
2.	2.	2.
3.	3.	3.
4.	4.	4.
5.	5.	5.
6.	6.	6.
7.	7.	7.

Recorder

Selected exemplar materials

Songs for Activity 9

1. Manners of a Host

Sawaddee, sawaddee. You and I say sawaddee
This is my father, my mother; don't linger to say sawaddee.
Sawaddee, sawaddee, I'll take you to a movie today.
Here are sister Tuk, sister Toy, brother Tu and back there,
uncle Rang and aunt Ree.

2. A Happy Heart

Happy heart, pleasant heart, happy sight
Happy heart, pleasant heart, happy sight
Oh.....la.....nor....., Oh.....la.....nor.....
When I meet you I'm happy.....happy.

Time allocation : The time allocation suggested here can be
flexible to suit the teacher's needs.

Activities 1-3	:	3	periods
Activities 4-5	:	3	periods
Activity 6	:	3	periods
Activities 7-8	:	3	periods
Activity 9	:	3	periods
Activity 10	:	3	periods
Activities 11-12	:	3	periods
Activity 13	:	3	periods
Activities 14-15	:	3	periods

Activity 16 is a continuing activity to be done outside classroom time.
Total 30 periods

Record of Student's Receiving Guests

Name of student : Kesorn Chaisand Grade P.2

Name of parents : Mr. Thongdee Chaisang

Number	Date	Name of Guests	What student did for the guests	Parents' opinion							Note	
				Greeting and conversation		Service given without being asked by parents			Service asked by parents			
				to be improved	good	very good	to be improved	good	very good	very good		
1.	4 Nov, 83	Mr. Prasit Mr. Rewadee	- Saying sawaddee - Taking them to the seats								She was not available when she was wanted to buy ice.	
2.												
3.												
etc.												

Note: A recorder here means a parent or a guardian, (In case a parent or a guardian cannot write, he can dictate and the student will write for him).

Information sheet for the Instructional Plan
Topic : Receiving Guests

Greeting and talking with guests

1. When visitors arrive at home, one should do the following:
 - 1.1 Pay respect, greet them with the word "Sawaddee" and ask who they want to see or what is the purpose of their coming.
 - 1.2 Invite them to sit in the place for receiving guest or in a drawing room or living room.
2. The conduct towards the guests :
 - 2.1 Serve the drink by putting it on the right-handed side of the guests
 - 2.2 The glass of water should be held at the lower part but not at the top of the glass
 - 2.3 If the guests are sitting, one must sit on one's knees when handing the glass.
 - 2.4 Inform your parents about the guests immediately
 - 2.5 Walk politely (bow one's back) when passing adults or when passing sitting guests
 - 2.6 Provide newspapers and an ash-tray for the guests while they are waiting
 - 2.7 When the guests have left, collect everything, clean them and put them in their places
 - 2.8 If your parents are not at home, take the message and inform your parents of everything later

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An Example of a job sheet

Job Sheet (Activity 10)

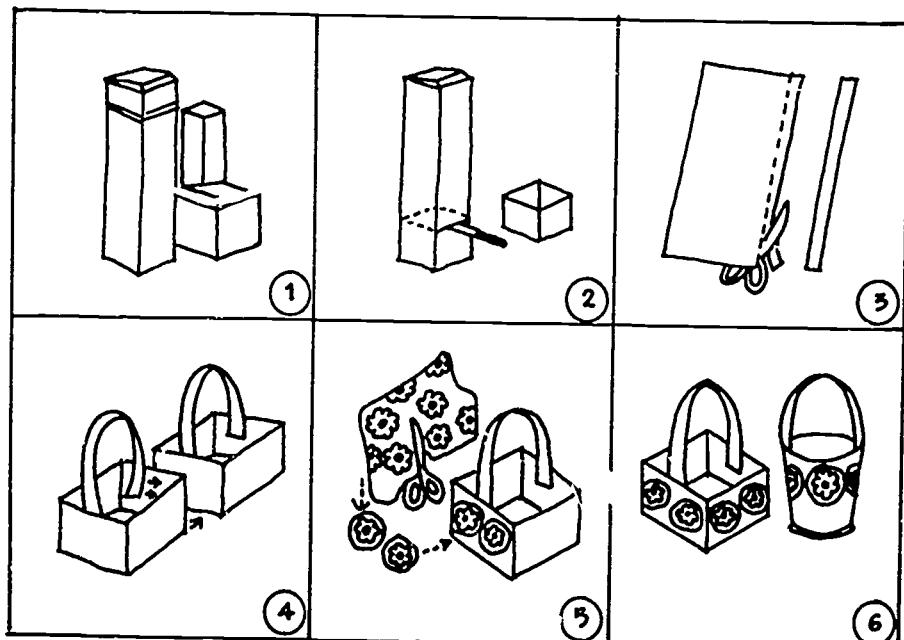
Job 1 : Making flower baskets (3 periods)

Materials

- A big tooth-paste box or any box, a book cover from a used notebook or hard paper, gift-wrap paper and glue
- A cutter or scissors

Operational steps

1. Cut the box to an appropriate size (see pictures 1 and 2).
2. Cut the paper into appropriate width and length for a handle (see picture 3).
3. Put the glue on both ends of the handle and stick each end at the middle of two opposite edges inside the box (see picture 4).
4. Cut the flowers or patterns from the gift-wrap paper and decorate the basket with them (see picture 5 and the picture of the finished products).



Flower baskets

Job 2 : Making flowers (3 periods)

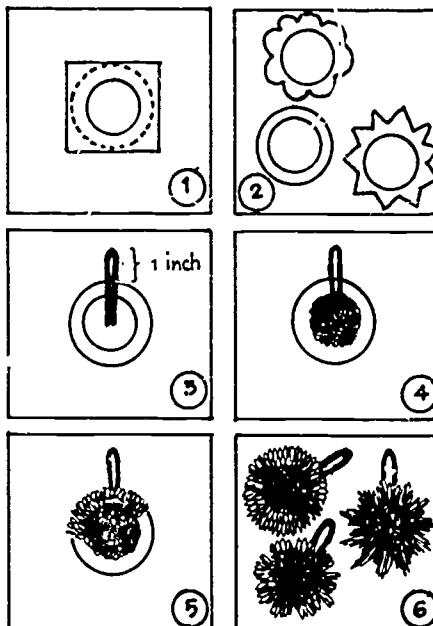
Materials

- Plant seeds such as mung beans, paddy, red seeds etc, glue, hard paper, thread and a one-baht coin
- Cutter or scissors

Operational steps

1. Put the coin on the paper and draw a circle which is to be the middle of the flower (see picture 1).
2. Draw another circle around the first one. This circle should be bigger with appropriate distance from the first one or you can make petals of flowers instead. Then cut the paper along the drawn lines (see picture 2).
3. Glue the cut paper. Cut a 3-inch-long (1.5 cm.) thread and fold it in the middle. Put the thread on the glued paper in such a way that the thread is 1 inch (2.5 cm.) outside the paper.
4. Put the mung beans or red seeds in the middle circle (see picture 4).
5. Put the paddy on the outer circle as flower petals.

When it is finished, it will be a flower (as in picture 5 and the picture of the finished flowers).



Making flowers

Making flowers

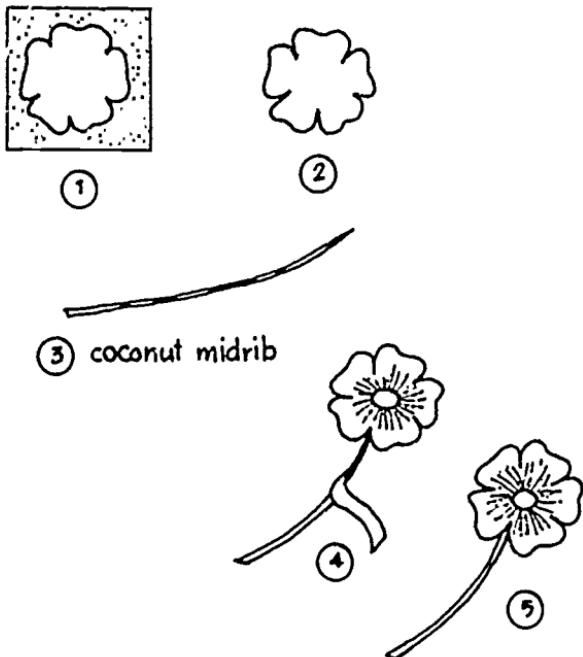
Job 3 : Making flowers (3 periods)

Materials

- Paper for making flowers available locally such as paper from used notebooks, newspapers, wrapping paper etc.
- Sticks for flower stem such as midribs from coconut leaves bamboo etc.
- Green elastic paper especially for wrapping around the stick. glue. and thread

Operational steps

1. Draw a pattern
2. Cut the pattern out of the paper
3. Paint the pattern with crayons.
4. Put the stem on the flower and cover it with green paper
5. Do the finishing touch



Making flowers

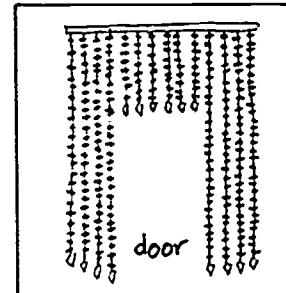
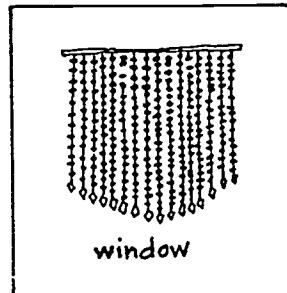
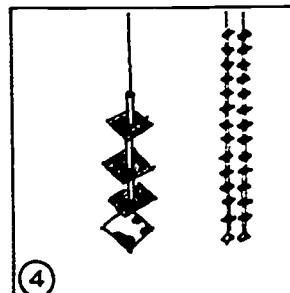
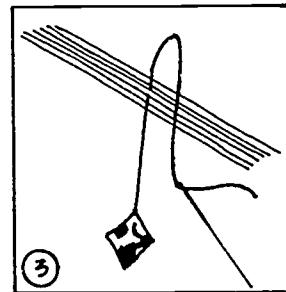
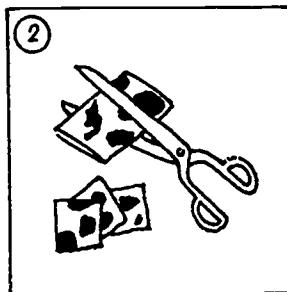
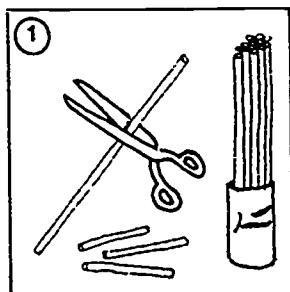
Job 4 : Making a curtain (3 periods)

Materials

- Straws, colour paper or covers of magazines, a stick and thread
- Scissors and needle

Operational Steps

1. Cut the straws into 1-2 inch-long (2.5 cm.-5 cm.) pieces (see picture 1).
2. Fold the coloured paper or the magazine cover as many times as you want to the appropriate width. Then cut it into square pieces (see picture 2.)
3. Cut the thread as long as the height of the window or the door for which the curtain is made and as many as you want. Use the needle and the thread to sew the first piece of paper at one of its corners (see picture 3).
4. Put the thread through the straw and then through the middle of a paper square. then the straw and the paper alternately until the line is as long as needed. Tie each line of straws and papers to be stuck. as many lines as you want. The lines should be an appropriate distance from each other. Then you have a curtain you want. (see the picture of the finished curtain)



Training educational personnel for integrated curriculum

Country: Thailand

Subject/Topic: Food

Course: Life experiences (Grade II)

Reported by: Dr. Siriporn Boonyananta

Introduction

This exemplar instructional plan is intended for use as a guide to teachers of grade II. The time to cover all the content and activities is seven periods (25-30 minutes for one period). The subject areas to be integrated during the course of instruction include : health science, language arts, mathematics and social studies. The teachers should keep in mind the main concept of the topic : Nutritious foods help build a strong body. The learning activities incorporated in the plan are suggestive and teachers can modify these to suit a particular class or group of pupils. The model may help teachers develop their own teaching plans.

This exemplar has been developed in the Curriculum Development Centre, Thailand by a group of primary school teachers, supervisors and CDC curriculum specialists. This has been tried out, revised and is now being used in all elementary schools of Thailand.

Unit of Food

An exemplar integrated instructional plan for Grade II

Concept Nutritious foods help build a strong body.

Objectives

1. Able to distinguish between nutritious and non-nutritious food items;
2. Able to select nutritious foods for lunch;
3. Able to play the role of buyer and seller of food; and
4. Able to add and subtract simple figures.

Content

1. Foods which are useful and those not useful to our body; and
2. Selection of foods including useful sweets for lunch.

Learning activities

1. Discussion on the need for food and identification of food taken daily by students. Teacher assists in preparing the list of foods and raw products such as pork, chicken, fresh fish, salted fish, fresh egg, salted egg, fresh vegetable, shrimp, chilli, string bean and preserved mango.
2. List all the raw products on the blackboard and let each student choose to prepare food for himself by writing the names of the products in small

cards. This activity is followed by discussion among students under the guidance of the teacher to see whether the food has been chosen appropriately.

3. Students relate their experiences about sickness such as stomach ache, diarrhoea and vomiting, related to food consumption. Teacher leads discussion to determine causes of sickness. Students reach conclusion about causes of sickness such as unclean food, food contaminated with harmful ingredients or chemicals, harmful bacteria or decomposed food.
4. List on the blackboard the foods taken by students during lunch time. Discuss and identify nutritious food and non-nutritious food. Students also decide what they should buy or should not buy for lunch.
5. Teacher and students prepare the following materials for role play on selling and buying food:
 - card (rice, soup, fried food, egg, noodle, fruit, sugar, sweet, fermented mango).
 - food containers or dishes made of paper or banana leaves.
 - food cover made of paper/leaves
 - place the cards representing food in the containers or dishes
6. Divide students into two groups of sellers and buyers (students, students and their mothers, students and teachers). Role play on the actual practice of selling and buying with conversation between students, student and mother, student and teacher on topics related to selection and buying of nutritious food and not buying unclean food.
7. Students practice addition and subtraction using figures obtained from buying and selling food.
8. Panel discussion to generalize the kinds of food that are useful and harmful.
9. Teacher asks students to bring their lunches to the classroom and observe the kinds of food and their respective nutritive value.
10. Students prepare a report on food, drawing conclusion from the previous activities.
11. Students prepare a chart showing nutritive value of the different kinds of foods.
12. Students draw pictures of fruit, fish, chicken, duck, pig, vegetable, etc. (Each student may draw one picture).

Instructional materials

1. Real and imitation specimens of vegetable; fruit, eggs, chicken, pork, rice etc. ;

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2. Ready-made food like curry, cooked rice, fried vegetable or flash cards with pictures of the food;
3. Sweets of different colours ;
4. Papers, colour pencils; and
5. Reference books on our food.

Evaluation

1. Observation -

Observe students' behaviour in group work, in selection and buying of food;

2. Check assignment -

Check progress of work assigned to be carried out by students ; and

3. Test -

Use both oral and written tests.

Annex-I
AGENDA

1. Inaugural Session
2. Consideration of the agenda
3. Sharing experiences and insights on orientation and training of key educational personnel in integration of curriculum.
4. Development of Orientation and training programme for key educational personnel.
5. Review and examinations of training materials on integrated curriculum
6. Development of the training materials.
7. Consideration and adoption of the report.

Annex-II
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Annex-III
LIST OF DOCUMENTS

Information Documents

ROEAP-83/APEID - SRS.ICPL/INF. 1 - General Information Paper

ROEAP-83/APEID - SRS.ICPL/INF. 2 - List of participants

Working Documents

ROEAP-83/APEID - SKS.ICPL/ 1 - Agenda

ROEAP-83/APEID - SRS.ICPL/ 2 - Annotated Agenda

ROEAP-83/APEID - SRS.ICPL/ 3 - Provisional schedule of work

ROEAP-83/APEID - SRS.ICPL/ 4 - Discussion paper for orientation of organizers of national training courses in the Implementation of Integrated curriculum in primary education.

ROEAP-83/APEID - SRS.ICPL/ 5 - Integration of subject areas in the curriculum at the primary school level in Bangladesh
by Dr. A. K. M. Obaid Ullah

ROEAP-83/APEID - SRS.ICPL/ 6 - Teacher Training Guidelines for Development of Teacher Leaflet
by Dr. A. K. M. Obaid Ullah

ROEAP-83/APEID - SRS.ICPL/ 7 - Technical paper on guidelines for developing training materials for integrated curriculum
by Mr. Shafiq Hasan Khan

ROEAP-83/APEID - SRS.ICPL/ 8 - Teaching of Environmental Studies I and II, reported by Mr. Shafiq Hasan Khan.

ROEAP-83/APEID - SRS.ICPL/ 9 - Implementing Integration in the primary school curriculum in Malaysia - country paper by Dr. Arfah B. Abdul Aziz.

ROEAP-83/APEID - SRS.ICPL/ 10 - The new primary school curriculum towards an Effective Implementation Ministry of Education, Malaysia, 1982
Reported by Dr. Arfah Bt. Abdul Aziz.

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ROEAP-83/APEID - SRS.ICPL/ 11 - Integrated primary school curriculum project in Nepal by Mr. Bishwa Nath Aryal.

ROEAP-83/APEID - SRS.ICPL/ 12 How to ask questions: Development of questioning skills in environmental studies by Mr. Bishwa Nath Aryal.

ROEAP-83/APEID - SRS.ICPL/ 13 - Integration of subject areas for Grade 1 and 2 in Korean Primary Education Curriculum, by Dr. Byong-sun Kwak.

ROEAP-83/APEID - SRS.ICPL/ 14 - Teaching pleasant life-Training manual. by Dr. Beong-sun Kwak

ROEAP-83/APEID - SRS.ICPL/ 15 - The country report of the outcomes of the joint innovative project "Integrated Curriculum at the Primary Level" by Mr. P.T. De S. Wijetunge.

ROEAP-83/APEID - SRS.ICPL/ 16 - Document on Implementation of Curriculum Revision - Elementary education by Mr. P. T. De S. Wijetunge

ROEAP-83/APEID - SRS.ICPL/ 17 - Implementation of the experimental integrated curriculum and in-service training programme for national officials and Specialists - Thailand country Report by Dr. Sirinporn Boonyanata

ROEAP-83/APEID - SRS.ICPL/ 18 - Example of the instructional plan of the experiential across - grade levels integrated curriculum: Unit 2 "We help our parents" - sub-unit 1 "Receiving guests", (Thailand) by Dr. Sirinporn Boonyanata.

LIST OF SELECTED APEID PUBLICATIONS
RELATING TO TRAINING OF EDUCATIONAL PERSONNEL
AND CURRICULUM DEVELOPMENT

- * *Implementing curriculum change. 1977.*
- * *Educational policy, curriculum development and implementation. 1978.*
- * *Developing instructional modules for teacher education: selected exemplar modules. 1978.*
- * *Teacher education: directions of change. 1979.*
- * *Universalizing education: strategies for development and use of instructional materials. 1979.*
- * *Universalizing education: selected innovative experiences — new techniques for preparing educational personnel. 1980.*
- * *New personnel profiles in relation to changes in society and educational systems. 1980.*
Social change and new profiles of educational personnel. 1981.
Distance learning for teacher education (3 volumes). 1982.
In-service primary teacher education in Asia. 1982.
Multiple class teaching and education of disadvantaged groups: national studies. 1982.
Integrating subject areas in primary education curriculum — a joint innovative project. 1982.
- * *Curriculum development, by Malcolm Skilbeck (APEID Occasional Paper No. 9, February 1982)*
Language development and intellectual functioning, by Kevin F. Collis (APEID Occasional Paper No. 10, July 1982)
Social change and training of educational personnel. 1982.

* Out of stock

The Asian Programme of Educational Innovation for Development (APEID) has as its primary goal to contribute to the building of national capabilities for undertaking educational innovations linked to the problem of national development, thereby improving the quality of life of the people in the Member States.

All projects and activities within the framework of APEID are designed, developed and implemented co-operatively by the participating Member States through over one hundred national centres which they have associated for this purpose with APEID.

The 23 Member States participating in APEID are: Afghanistan, Australia, Bangladesh, China, India, Indonesia, Iran, Japan, Lao People's Democratic Republic, Malaysia, Maldives, Nepal, New Zealand, Pakistan, Papua New Guinea, Philippines, Republic of Korea, Samoa, Singapore, Socialist Republic of Viet Nam, Sri Lanka, Thailand and Turkey.

Each country has set up a National Development Group (NDG) to identify and support educational innovation for development within the country and facilitate exchange between countries.

The Asian Centre of Educational Innovation for Development (ACEID), an integral part of the Unesco Regional Office for Education in Asia and the Pacific in Bangkok, co-ordinates the activities under APEID and assists the Associated Centres (AC) in carrying them out.

The eight programme areas under which the APEID activities are organized during the third cycle (1982-1986) are:

1. Universalization of education: access to education at first level by both formal and non-formal means;
2. Education for promotion of scientific and technological competence and creativity;
3. Education and work;
4. Education and rural development;
5. Education and urban development;
6. Educational technology with stress on mass media and low-cost instructional materials;
7. Professional support services and training of educational personnel;
8. Co-operative studies, reflections and research related to educational development and future orientations.